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OPERATIONAL PROCEDURES FOR

MALAYSIAN RINGGIT (MYR) SETTLEMENT IN THE REAL TIME ELECTRONIC TRANSFER OF FUNDS AND SECURITIES SYSTEM (RENTAS)

Version 2.1

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Document Details

Effective Date:	20 May 2015
Document Owner:	Large Value Payments and Securities Services

Revision History

Version No.	Date of Update	Summary of Change	Updated By
1.0	17 Feb 2011	Approved version	MyClear
1.1	06 May 2011	**Clause 8.2** • Added the statement "No borrowing from "K account"" **Clause 8.6** • Amended the cut-off time from 3:30pm to 3:00pm due to feedback arising from participants. Restructured the statement. **Clause 9.2** • Replaced the statement "but are not limited to" with "are as follows" **Clause 12.5** • New provision on Liquidity Optimizer Settlement Facility **Clause 14.2** • Amended the exceptional circumstances under which MyClear can consider a RENTAS cut-off extension **Clause 14.10** • Deleted the statement "including BNM" **Clause 17.11** • Replaced the word "punitive" with "higher" **Clause 25.2** • Updated the Note below the diagram to incorporate the following: "Participants will be notified accordingly whenever MyClear operates its services from its Recovery Centre" **Clause 25.3:** • Updated the scope of testing for greater clarity **Guideline II, Clauses 2.2.6 (i) and (ii)**	MyClear

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Version No.	Date of Update	Summary of Change	Updated By
		• Removal of indemnity notations found in Version 1.0 for standardization with indemnity notation found in Clause 3.1 **Appendix I, MyClear Payment Services** • Updated the following email address: ○ slkoh@myclear.org.my ○ tunkuazlan@myclear.org.my ○ ashikin@myclear.org.my ○ shukor@myclear.org.my	
1.2	23 Feb 2012	**Title of Operational Procedures** • Amended the title of "Operational Procedures for Real Time Electronic Transfer of Funds and Securities (RENTAS)" to "Operational Procedures for MYR Settlement in the Real Time Electronic Transfer of Funds and Securities System (RENTAS). **Clause 1.0** • Added the word "MYR Settlement" to indicate that the Operational Procedures are for "MYR Settlement" services only **Clause 1.2.2** • Added reference to the new *Operational Procedures for Foreign Currency Settlement in RENTAS* issued in February 2012 **Clause 4.0** • Updated the RENTAS architecture to reflect additional foreign currency settlement services. **Clause 6.1** • Amendment to the classes of RENTAS membership due to the introduction of Foreign Currency Settlement Services. Added new class of membership for "foreign central banks" and "multi-lateral development banks". **Clause 8.0** • New process for existing RENTAS Foreign Currency Participants to subscribe to MYR Settlement Services. **Clause 9.0** • Replaced "RENTAS Operating Hours" with "MYR Settlement Business hours".	MyClear

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Version No.	Date of Update	Summary of Change	Updated By
		Clause 11.0 • Added the word "MYR" into Intraday credit facility. **Clause 15.0** • New process for the "Request for Extension of PvP Settlement Cut-off Time" **Clause 16.0** • Replaced "Request for Extension of Cut-off Time" with "Request for Extension of MYR Settlement Cut-off Time" • Amendment to the duration of the requirement to send the form via fax to MyClear for the request of extension. Amendment from "within five (5) minutes to within thirty (30) minutes". **Clause 19.0** • Amendment to the last resort mechanism to address situations where intraday credit cannot be redeemed at MYR Settlement Cut-off time. **Clause 29.0, Clause 30.0 and Clause 31.0** • Improved to provide clarity on how abnormal situations, such as RENTAS CHS, e-PKI and network connectivity failure, would be managed. **Guideline 1** • Added the word "MYR" into the Guidelines on Third Party Payments. **Appendix I, MyClear Payment Services** • Updated list of MyClear officers and their contact information. **Appendix II** • Replaced Appendix II of Schedule of Fees and Charges from the Operating Procedures for MYR Settlement with new form to be used for the Request for Extension of RENTAS PvP Settlement Cut-off Time. • Schedule of Fees and Charges is now centralized in the Participation and Operation Rules for Payment and Securities Services. **Appendix II (b)** • Form for Request for Extension of RENTAS	

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		MYR Settlement Cut-off Time. **Appendix V (Form A)** • New form to be used for the Confirmation of Participation. **Appendix V (Form B)** • New form to be used for the Confirmation of Participation.in Additional Services	
1.3	30 Mar 2012	**Clause 1.2** Added Clause 1.2.3 on Operational Procedures for Cross-Border Securities Custody Services in RENTAS issued in March 2012. **Clause 4.0** Added "Euroclear/CSDs Link" into the diagram. **Clause 5.1** Added Clause 5.1.6 on the definition of RENTAS Euroclear Link. **Clause 8.0 and 8.1** Added the words "or Cross-Border Securities Custody Services Participants" into the sentence. **Appendix V (Form A and Form B)** Added an additional option to subscribe to Cross-Border Securities Custody Services.	MyClear
1.4	7 May 2012	**Clause 6.1.2** For MYR (a) Settlement Services: Rewording of table row to suit future situation in the event of additional services subject to BNM approval. **Clause 6.1.3 (iv)** Added new requirement for admission to RENTAS. **Clause 10.4 until 10.8** Added new clause on finality of settlement for SSDS transactions. **Clause 13.5.6** Revised LOSF operating hours from 8:00am to 2.30pm to 9:00am to 4:00pm. **Clause 30.0**	MyClear

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Version No.	Date of Update	Summary of Change	Updated By
		Added new procedures for Mini RENTAS, the last resort contingency system. **Numbering of clauses:** Due to insertion of Clause 30.0, all other clauses beginning from Clause 30.0 in Version 1.3 has been re-numbered (+1). **Clause 33.2** Added a form (Appendix XII) for participants to request use of RENTAS test environment. **Appendix XII** New request form for RENTAS test environment.	
1.5	11 Sept 2012	**Clause 9.2** Extension of cut-off time for all repayments of maturities from 11:00am to 11:30am.	MyClear
1.6	6 Sep 2013	**Clause 9.2** Added new clause to incorporate the revised settlement time for FPX, Direct Debit and Interbank GIRO clearing positions. **Clause 11.4** Provide clarity that securities due for redemption are not eligible as collateral for intraday credit. **Clause 30.13** Added new clause to make it compulsory for RENTAS Participants to participate in annual mini-RENTAS test run **Guidelines appendices and relevant clauses** To change the BCP related communication channel to compliance.lvp@myclear.org.my **Appendices and relevant clauses** Reflect MyClear's new office address: Director Large Value Payments and Securities Services Division Malaysian Electronic Clearing Corporation Sdn. Bhd. (MyClear) Level 10, Tower 2A, Avenue 5, Bangsar South	MyClear

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Version No.	Date of Update	Summary of Change	Updated By
		8, Jalan Kerinchi 59200 Kuala Lumpur **Appendix V – Form A & B** Strengthen procedures for disclosing information to meet requirements for "permitted disclosures" under Section 134, Schedule 11 Clause 1 of the Financial Services Act (FSA).	
1.7	06 Dec 2013	**Table 9.2** To incorporate 2nd Interbank GIRO settlement at 12:00 noon (in addition to existing settlement at 4:20 pm) **Clause 10.2** The changes are intended to include **IFTS payments** processed by Mini RENTAS in the conditions for finality. **Clause 10.4** The changes are intended to include **SSDS sales and repos** processed by Mini RENTAS in the conditions for finality. **Clause 10.6** The changes are intended to include **free-of-payment** transactions processed by Mini RENTAS in the conditions for finality. **Clause 14.1** Delete 30 minutes deal confirmation and make reference to Operational Procedures for Securities Services. **Footnote to Clause 27.3** Provide clarity to requirement to cover all BCP and DR scenarios every three years: • Provide definition for "Network Connectivity" and Participant's Internal Systems in the RENTAS BCP and DR scenarios for further clarity. • Define method of computing the duration of three years given to participants to cover BCP scenarios. **Appendix I** Change the domain of RENTAS email address from rentas@bnm.gov.my to rentas@myclear.org.my.	MyClear

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Version No.	Date of Update	Summary of Change	Updated By
1.8	11 Aug 2014	**Clause 27.3** To provide definition of network connectivity as follow: Note: Network connectivity refers to the point where NWI originate at the Participant's site	MyClear
2.0	5 Jan 2015	**Clause 5.4.1** To provide clarity that BNM owns the e-PKI system. **Clause 8.3** To add in Clause 7.9 as one of relevant clause to be read in Clause 8.3. **Clause 9.1** MYR Settlement Business hours is extended to facilitate multiple Interbank GIRO Settlements. **Clause 9.2** • Added new settlement time for each Interbank GIRO clearing window. • Established a MYR Evening Settlement Window to facilitate settlement of Interbank GIRO clearing position after 6:00pm. • Introduced new time for auto-deposit/ acceptance facility and repayment **Clause 9.11** New clause to provide clarity that the MYR Evening Settlement Window is open for Interbank GIRO settlement only. **Clause 11.0** To rename existing clause to reflect the expanded scope of this section with the inclusion of ACOFF: **MYR Intraday Credit and Automatic Collateralized Overnight Funding Facilities** **Clause 11.1** New sub clause specifying the types of credit facilities in RENTAS: MYR Intraday and Auto-Collateralized Overnight Funding Facility **Clause 11.2** Provide clarity that Intraday credit is only offered between 8:00am – 6:00pm.	MyClear

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		Clause 11.5 Provide clarity that securities in the collateral (K account) account are not eligible as collateral two Business days before redemption. **Clauses 11.14 – Clause 11.26** New clauses to specify the ACOFF process **Clause 17.2** New requirement on submission of incident reports **Clause 19.12** Add new clause to explain how unpaid ACOFF is managed **Clause 25.3** To provide clarity that issues with billing has to be reported to MyClear within fourteen (14) calendar days. **Clause 27.2** Participant's operating site of RENTAS MC should be read and understood as: • Production Site • Disaster Recovery **Clause 27.3** Add additional footnote no. 5 at the word of following* : • For participants who have completed the requirements as at 31 December 2014, they shall attempt to cover **as many applicable scenarios as possible**, until the full implementation of new RENTAS which is scheduled in 2016. **Clauses 37.1 –37.9** Specify new processes for "Auto-Deposit/ Acceptance Facility (ADF)" **Guideline I : Guideline on MYR Third Party Payments** **Clause 6.2** Specify Payment Reference Standards to facilitate reconciliation under the ePIF framework	

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Version No.	Date of Update	Summary of Change	Updated By
		Clause 6.3 New clause added. To specify the Payment Reference Standard for both Beneficiary party and Ordering party. **Guideline II : Guidelines on Compensation on Inter-Bank Failed Settlements** **Clause 1.1** To specify the resolution time for compensation claim to ensure timely completion. **APPENDICES** **Appendix XI : RENTAS BCP Live Run Checklist** • All references made to **"MyClear's IT Service Provider"** replaced with **"RENTAS MC IT Service Provider"** This is to improve clarity which party is accountable for RENTAS front-end support. • All references made to **"chs.backup=settle@bnm.gov.my"** replaced with **chs.backup=settle2048@bnm.gov.my** This is to reflect the use of new 2048bit digital certificate.	
2.1	16 April 2015	**Document Information** Removal of "Release Date" to avoid confusion with "Effective Date". **Clause 9.2** To remove the Auto Deposit Facility and include the Activation of ACOFF in the MYR Settlement Business Hours **Clause 11.14-11.30** To rephrase the entire all clauses on Auto Collateralized Overnight Funding Facility (ACOFF) to make it easier to understand **Clause 37.0** To remove the entire clause on Auto Deposit Facility arising from the facility being called off effective 9th Feb 2015. **Guideline II – 1.3 & 1.4** To rephrase "MYR Inter-bank Payments" to "MYR Inter-bank Settlements" and "MYR Inter-bank failed payments" to "MYR Inter-bank failed settlements" in the Guidelines on Compensation on Inter-Bank Failed Settlements, to provide clarity to participants.	MyClear

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Document Information

Operational Procedures for MYR Settlement in RENTAS

For Participants of RENTAS

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This document contains proprietary information, which should not be produced in whole or in part, nor released to third parties nor used for unauthorised purposes, without the prior written agreement from Malaysian Electronic Clearing Corporation Sdn. Bhd. (MyClear)

For Glossary of Terms, please refer to the Participation and Operation Rules for Payments and Securities Services.

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1.0 Introduction

1.1. The Operational Procedures provides an overview of MYR Settlement in RENTAS.

1.2. These Operational Procedures shall be read in conjunction with the following documents:

1.2.1. Participation and Operation Rules for Payment and Securities Services;

1.2.2. Operational Procedures for Foreign Currency Settlement in RENTAS;

1.2.3. Operational Procedures for Cross-Border Securities Custody Services in RENTAS;

1.2.4. Bank Negara Malaysia's Guidelines on Standing Facilities; and

1.2.5. Other relevant guidelines, notices, circulars issued by MyClear or BNM from time to time.

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2.0 Purpose

2.1. These Operational Procedures are intended to equip Participants with an operating knowledge of MYR Settlement in RENTAS and serve as a basis for Participants to develop comprehensive internal procedures.

2.2. These Operational Procedures take effect from **20 May 2015*.***

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3.0 Definition of RENTAS

3.1. RENTAS is a multi-currency real time gross settlement system for inter-bank funds transfer, a securities settlement system and a scripless securities depository for all unlisted debt instruments.

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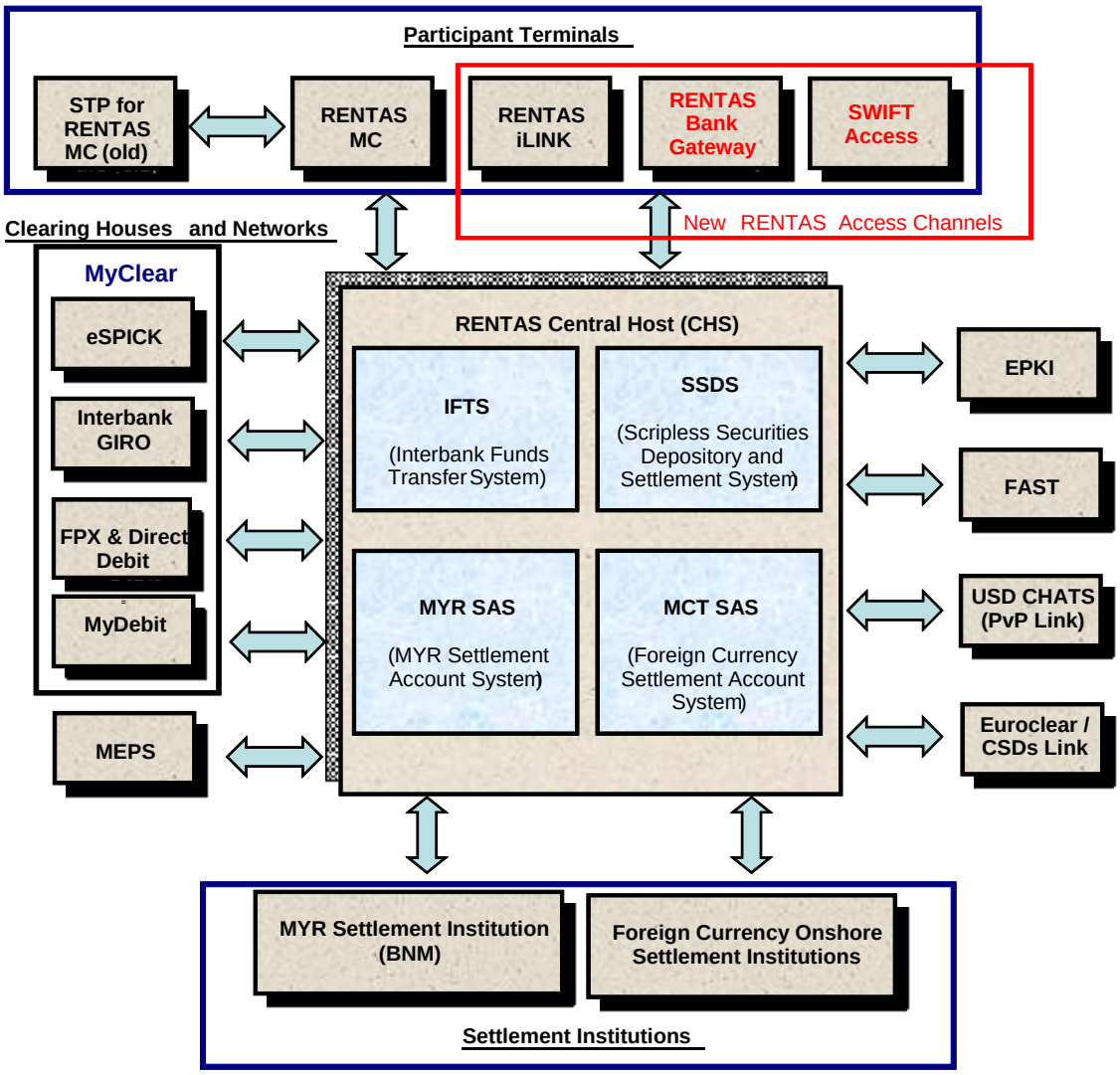
4.0 Overview



4.1. Using RENTAS, Participants may initiate payment and securities transactions. Ringgit transactions are initiated via the RENTAS member computer (MC) while foreign currency transactions are initiated via RENTAS Bank Gateway, SWIFT Access and RENTAS iLINK. These Participant Terminals transmit the transactions to the RENTAS Central Host System (RENTAS CHS) where the transactions are processed by simultaneously debiting the paying Participant and crediting the receiving Participant's MYR Settlement Accounts maintained with Bank Negara Malaysia (BNM) or the Participant's Foreign Currency Settlement Accounts maintained with designated Onshore Settlement Institutions (OSI). Upon completion of funds transfer transactions, RENTAS CHS will update the transaction status as completed in RENTAS iLINK.

4.2. The RENTAS CHS will process all transactions on an online and real time basis. Participants may perform online queries on the status of their foreign currency transactions and account balances via RENTAS iLINK.

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5.0 System Components

5.1. RENTAS Central Host System (RENTAS CHS)

The RENTAS CHS consists of the following major modules:

5.1.1. **Inter-bank Funds Transfer System (IFTS)**

This module receives, validates, queues and processes fund transfer transactions and cash Settlements. It then relays the transactions to the MYR Settlement Account System (MYR SAS) or the Foreign Currency Settlement Account System (MCT SAS), where debit and credit transactions are posted to the Participants' MYR Settlement Account or foreign Currency Settlement Account respectively.

5.1.2. **MYR Settlement Account System (MYR SAS)**

This is a real-time accounting module that posts debits and credits to MYR cash accounts across the books of BNM. All MYR Settlement Accounts are maintained with BNM.

5.1.3. **Foreign Currency Transfer Settlement Account System (MCT SAS)**

This is a real-time accounting module that posts debits and credits to foreign currency cash accounts across the books of OSIs. All Foreign Currency Settlement Accounts are maintained with OSIs.

5.1.4. **Scripless Securities Depository and Settlement System (SSDS)**

This module receives, validates, queues and processes securities sales, repos, free-of-payment transfers and pledges. It then simultaneously initiates debit and credit to the Securities Account of the buyer and seller and synchronizes securities Settlement with cash Settlement in the IFTS module to achieve Delivery versus Payment (DvP).

5.1.5. **Payment vs Payment (PvP) Link to USD CHATS**

PvP is a cross border link between the RENTAS system and the USD CHATS system in Hong Kong. This link provides real-time Settlement for foreign exchange (FX) transactions involving US Dollars (USD) and MYR, whereby USD settlement takes place in USD CHATS, while MYR settlement takes place in RENTAS.

5.1.6. **RENTAS Euroclear Link**

This is a cross-border link between RENTAS and Euroclear. This link allows RENTAS to offer securities Settlement and custody services through the Euroclear

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System and serves as the basis for Cross-Border Securities Custody Services in RENTAS (CSCS).

5.2. Member's Computer (MC)

5.2.1. RENTAS Participants use MC to enter, transmit and receive MYR funds and securities transactions. MC runs on two (2) technology platforms; namely IBM AS400 (MC / 400) and Windows (MC / PC).

5.3. Network

5.3.1. The Member's Computers connect to RENTAS CHS via a secure private communication network provided by a third party provider determined by MyClear.

5.4. Enterprise Public Key Infrastructure (e-PKI)

5.4.1. Enterprise Public Key Infrastructure (e-PKI) provides data authenticity, integrity and non-repudiation features, thus ensuring the security of RENTAS. e-PKI is an enterprise security system owned and operated by BNM.

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5.5. RENTAS iLINK

5.5.1. RENTAS iLINK is a web-based system that provides real-time information such as cash positions, securities holdings and Settlement status of transactions.

5.5.2. RENTAS iLINK also acts as a Participant Terminal that:

i. Allows initiation of foreign currency funds transfer and provides real-time on-shore foreign currency settlement to Participants who maintain foreign currency accounts with Onshore Settlement Institutions. Please refer to the Operational Procedures for Foreign Currency Settlement in the RENTAS for further details; and

ii. Allows initiation of CSCS Settlement instructions and custody operation instructions.

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5.6. RENTAS MC – Straight Through Processing (STP) Module for MYR Settlement

5.6.1. This is an optional module which provides for automated and online transmission of MYR transactions from Participants' internal systems without the need for data entry or manual intervention at MC.

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6.0 RENTAS Membership

6.1. Types of RENTAS membership

6.1.1. RENTAS Membership is open to entities that meet the following criteria:

i. Financial Institutions ("FIs") regulated by BNM and institutions under BNM's purview;

ii. Investment banks co-regulated by BNM and the Securities Commission of Malaysia;

iii. International Central Securities Depository (ICSD) and National Central Securities Depository (CSD);

iv. Central banks / monetary authorities, qualified foreign licensed financial institutions and multi-lateral development banks;

v. Qualified domestic entities that provide payment and clearing services (clearing houses);

vi. Qualified institutions whose admission will promote the development of the Malaysian financial markets.

6.1.2. There are six (6) types of RENTAS membership as illustrated in the table below:

	Type 1	**Type II**	**Type III**	**Type IV**	**Type V**	**Type VI**
Type of Institution	• Licensed FIs regulated or co-regulated by BNM • Institutions under BNM's purview	• Development Financial Institutions • Domestic entities admitted for market development purposes	ICSDs and CSDs	Foreign central banks	Qualified foreign entities and multi-lateral institutions	• Clearing houses • Qualified local corporates
For MYR: a) Settlement Services	Access to both Settlement and Securities Accounts	Access to both Settlement and Securities Accounts	Access to Securities Accounts only (1)	Access to Securities Accounts for own holdings only (1)	Access to Securities Accounts for own holdings only	Access to Settlement and Securities Accounts for own holdings only (1)
b) Intraday credit facility	Yes	No	No	No	No	No
c) Direct Participation	Yes	Yes	Yes	Yes	Yes	Yes

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	Type 1	Type II	Type III	Type IV	Type V	Type VI
For Foreign Currencies: a) Settlement Services	Access to both Settlement and Securities Accounts	Access to both Settlement and Securities Accounts	Access to Securities Account	Access to Securities Account for own holdings only	Access to Securities Account only	Access to Settlement Accounts only
b) Intraday Credit Facility	At the discretion of OSI where the Participants maintain their foreign currency account.					
c) Direct Participation	Yes	Yes	Yes	Yes	Yes	Yes

6.1.3. Potential participants seeking admission to RENTAS shall fulfil the following requirements:

i. Demonstrate financial soundness.
ii. Have sufficient liquidity position or credit lines to cover the participants' maximum expected settlement obligation in RENTAS.
iii. Have sufficient expertise and resources to operate RENTAS.
iv. Possess sufficient risk management and business continuity planning framework and policies.

6.1.4. Foreign entities with access to only securities accounts in RENTAS shall open a MYR cash account with a Malaysian bank for MYR cash settlement purposes and shall ensure sufficient liquidity at their participating banks, either by maintaining sufficient balances or by obtaining access to credit lines.

6.1.5. Documents that have to be submitted for the participation application shall include:

i. The latest three (3) years audited financial statements.
ii. Certificate of incorporation.
iii. Board resolution approving participation in RENTAS.
iv. Memorandum and articles of association.

6.1.6. Participants may be requested to submit documents on an annual basis to provide evidence that they are in compliance with the requirements outlined in Clause 6.1.3.

6.1.7. MyClear may waive document submissions for entities that are regulated by BNM, or entities under BNM's purview.

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7.0 Admission of New Participant for MYR Settlement in RENTAS

To participate in RENTAS MYR Settlement, new Participants shall undertake the following:

7.1. Complete and submit the "Confirmation of Participation" form to MyClear as per Appendix V (Form A), "Contact Person for the Daily Operation of RENTAS" form as per Appendix VIII and "RENTAS - Authorised Signatories List" form as per Appendix IX. Please also refer to MyClear's contact details in Appendix I;

7.2. Open a MYR Settlement Account directly with Currency Management and Operation Department of BNM. Please refer to Appendix I for the contact details;

7.3. Open a Securities Account with BNM (via MyClear), if applicable;

7.4. Obtain a Bank Identification Code (BIC) by registering with The Society for Worldwide Inter-bank Financial Telecommunication (SWIFT). The BIC will be used as part of a unique identifier code (UIC) for the Participant;

7.5. Obtain a digit code from BNM. This code is to be used as the UIC for each Participant[1];

7.6. Acquire the RENTAS application software (MC/PC or MC/400) from MyClear's designated vendor;

7.7. Acquire the necessary application software, hardware, operating systems, and database software that are compatible with RENTAS MC;

7.8. Deploy communication network for RENTAS. Currently the system uses a communication network provided by TIME dotCom Sdn Bhd and an ISDN dial-up provided by Telekom Malaysia (TM) Berhad;

7.9. Deploy e-PKI security module (HSMs, tokens and certificates) for RENTAS;

7.10. Establish a Business Continuity Plan (BCP) for the Participant's RENTAS MYR Settlement operations;

[1] For institutions that are not under the purview of BNM, the UIC will be provided by MyClear.

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7.11. Establish processes, internal controls and procedures to ensure that RENTAS MYR Settlement operations are carried out with minimal risk to the Participants, counterparties and MyClear;

7.12. Notify MyClear's Payment Services Section for the activation of access to RENTAS iLINK; and

7.13. Notify MyClear in writing two (2) weeks before the actual implementation date of operations.

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8.0 Existing RENTAS Foreign Currency Participants or Cross-Border Securities Custody Services Participants Subscribing to MYR Settlement Services

8.1. Existing RENTAS Participants in RENTAS' Foreign Currency Settlement Services or Cross-Border Securities Custody Services who have received approval from MyClear to participate in MYR Settlement Services shall open a MYR Settlement Account directly with Currency Management and Operation Department of BNM.

8.2. The Participants shall complete and submit the "Confirmation of Participation in Additional Services" form to MyClear as per Appendix V (Form B), two (2) weeks before the actual implementation date of the Participants' MYR Settlement operations.

8.3. In addition, the Participants shall undertake the tasks mentioned in 8.1 and Clauses 7.5 to 7.11.

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9.0 MYR Settlement Business Hours

9.1. The Business hours for MYR Settlement in RENTAS is from 8.00 am to 9.00 pm on all Business days.

9.2. The detailed schedules for MYR Settlement activities in RENTAS are as provided in the table below:

Scheduled Time	Actions
8:00 am	MYR Settlement opening
8:00 am	Repayment of Automatic Collateralized Overnight Funding Facility (ACOFF) to BNM
8:30 am	Start time for PvP Link to USD CHATS
8:45 am	eSPICK normal clearing settlement
8:50 am	MYR Settlement for Interbank GIRO clearing – 1st window
11:00 am	Forward value dated transactions (including PVP/DVP Settlement)
11:30 am	Cut-off time for all repayments of maturities and settlement for e-Debit, MEPS Cash and Shared ATM clearing
11:50 am	MYR Settlement for Interbank GIRO clearing – 2nd window
2:50 pm	MYR Settlement for Interbank GIRO clearing – 3rd window
3:30 pm	Cut-off time to send PvP payment instructions to Participant's banker in Hong Kong
4:00 pm	MYR Intraday Credit Cut-off Warning
	Cut-off time for paying Participants to initiate MYR third party transaction and PvP transaction (MYR Leg)
4:15 pm	MYR Settlement for Financial Processing Exchange and Direct Debit clearing
4:30 pm	MYR intraday credit cut-off. No borrowing from 'K' account.
5:00 pm	Cut-off warning for PvP Link to USD CHATS
5:30 pm	Cut-off time for PvP Link to USD CHATS
6:00 pm	Cut-off time for the repayment of MYR Intraday Credit Facility MYR Settlement Cut-off time

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Scheduled Time	Actions
6:00 pm	Start of MYR Evening Settlement Window and Activation of ACOFF
6:10 pm	MYR Settlement for Interbank GIRO clearing – 4th window
By 8:30 pm	MYR Settlement for Interbank GIRO clearing – 5th window[2]
By 9:00 pm	MYR Evening Settlement Window Cut-off[3]

9.3. MyClear may amend the MYR Settlement Business hours in Clause 9.2., if circumstances warrant such a change, either temporarily or permanently.

9.4. Participants are strongly advised to observe the cut-off times for payments and settlements as delays may affect the liquidity of counterparties that are expecting these payments. In the event of unavoidable delays, the paying Participants shall communicate directly with the receiving Participants on the delay.

9.5. To avoid possible transaction congestion during peak hours and the risk of failed Settlement, Participants are encouraged to transmit their messages as early as possible.

9.6. As stated in Clause 9.2, the MYR third party transaction cut-off time for RENTAS MYR Settlement Participants is 4:00 pm. Participants are allowed to impose an earlier cut-off time for their customers but the cut-off time for customers should be no earlier than 3:00 pm.

9.7. Availability of Funds for Beneficiary

9.7.1. All receiving Participants shall make funds available to the beneficiary customers within 30 minutes of receiving a credit confirmation advice from RENTAS CHS.

9.7.2. All paying Participants shall transmit payment instructions to RENTAS CHS within 30 minutes of receiving an instruction from the paying customers.

9.8. MYR Intraday Money Market Deals

9.8.1. The lender / investor must pay the borrower / investee within thirty (30) minutes from the time the deal is done.

[2] MyClear may vary the "MYR Settlement for Interbank GIRO clearing – 5th window" time depending on when the Interbank GIRO clearing positions are available.

[3] MyClear may vary the Evening Settlement Window Cut-off so that it occurs immediately after the "MYR Settlement for Interbank GIRO clearing – 5th window" time.

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9.9. Same day value for Money Market (MM) / Foreign Exchange (FX) deals

9.9.1. Deals transacted before 5:00 pm are to be settled by 5:30 pm.

9.10. Forward Dated Transactions

9.10.1. Participants may key-in through their MC same day value and forward dated transaction as follows:

i. IFTS: One (1) Business day forward-dated;

ii. PvP : Forward-dated for up to one (1) calendar year; and

iii. SSDS: Forward-dated for to one (1) calendar year.

9.11. During the MYR Evening Settlement Window, Participants shall only perform transactions to facilitate the settlement of Interbank GIRO clearing positions.

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10.0 MYR Settlement Account and Settlement Finality

10.1. All RENTAS MYR Settlement Accounts and Securities Accounts are maintained with BNM. Hence, RENTAS MYR transactions are settled across the books of the central bank. The settlement asset is a claim on the central bank.

10.2. All RENTAS payments are final and irrevocable after the paying Participant submits the payment to RENTAS CHS or Mini RENTAS (in the event the contingency system is activated in accordance with Clause 29.2), and the payment has met all conditions necessary to execute the final transfer of funds across the books of BNM. The conditions for final settlement across the books of BNM are as follows:

10.2.1. Paying Participant has sufficient liquidity to cover the payment;

10.2.2. Paying Participant is in good standing, whereby its membership status is not suspended, frozen or terminated;

10.2.3. Value date of payment is a Business day;

10.2.4. Receiving participant is in good standing, whereby its membership status is not frozen or terminated;

10.2.5. Payment submission time is within the MYR Settlement Business Hours specified in Clause 9.0;

10.2.6. The payment Message content and remittance information meets the requirements specified herein.

10.3. Once all the above conditions are met, the Paying Participant's account is debited, and receiving Participant's account is credited on a final and irrevocable basis.

10.4. All RENTAS SSDS sales and repos are final and irrevocable after the seller submits the transaction to RENTAS CHS or Mini RENTAS (in the event the contingency system is activated in accordance with Clause 29.2), the buyer confirms the transaction, and the transaction has met all conditions necessary to execute the final transfer of funds across the books of BNM from the buyer to seller's Settlement Accounts, simultaneously against the transfer of securities from the seller to the buyer's Securities Accounts. The conditions for final settlement across the books of BNM are as follows:

10.4.1. Buyer has sufficient liquidity to cover the securities purchase;

10.4.2. Seller has sufficient securities to deliver;

10.4.3. Both buyer and seller are in good standing, whereby its membership status is not suspended, frozen or terminated;

10.4.4. Value date of payment is a Business day;

10.4.5. Securities transacted is valid, transferable and has not matured;

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10.4.6. Transaction submission time is within the MYR Settlement Business Hours specified in Clause 9.0;

10.4.7. The transaction Message content and remittance information meets the requirements specified herein.

10.5. Once all the above conditions are met, the buyer's Settlement Account is debited, seller's Settlement Account is credited, buyer's Securities Account is credited, and the seller's Securities Account is debited on a final and irrevocable basis simultaneously.

10.6. All RENTAS SSDS free of payment transfers are final and irrevocable after the transferring Participant submits the transaction to RENTAS CHS or Mini RENTAS (in the event the contingency system is activated in accordance with Clause 29.2), the receiving Participant confirms the transaction, and the transaction has met all conditions necessary to execute the final transfer of securities from the transferring Participant to the receiving Participant's Securities Account. The conditions for final settlement across the books of BNM are as follows:

10.6.1. Transferring Participant has sufficient securities to deliver;

10.6.2. Both transferring and receiving Participants are in good standing, whereby their membership status are not suspended, frozen or terminated;

10.6.3. Value date of payment is a Business day;

10.6.4. Securities transacted is valid, transferable and has not matured.

10.7. Once all the above conditions are met, the transferring Participant's Securities Account is debited and the receiving Participant's Securities Account is credited on a final and irrevocable basis.

10.8. For USD securities settled on DvP via USD CHATS, the transactions are considered final when:

10.8.1. the US dollar securities is credited into the purchaser's account in RENTAS; and

10.8.2. cash is transferred to the seller via Participants' correspondent bank's account with the USD CHATS settlement bank in Hong Kong.

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11.0 MYR Intraday Credit and Auto-Collateralized Overnight Funding Facilities

11.1. Eligible Participants may draw on the following credit facilities offered by BNM :

11.1.1 MYR Intraday Credit Facility

11.1.2 MYR Automatic Collateralized Overnight Funding Facility (ACOFF)

MYR Intraday Credit Facility

11.2. The MYR Intraday credit facility in RENTAS is a credit line provided by BNM to the Participants between MYR Settlement Opening time until MYR Intraday Credit cut-off to ensure that there is sufficient liquidity in RENTAS to effect Settlements on a timely basis. BNM will determine which Participants are eligible for Intraday credit. No Intraday credit facility is provided during MYR Evening Settlement Window.

11.3. The MYR Intraday credit is granted in the form of collateralized borrowing in tranches of RM5 million against Eligible Securities of the eligible Participants. The eligible Participants will be provided with a collateral account ("K account") to facilitate the earmarking of collateral securities for the MYR Intraday credit drawdown.

11.4. The repayment of MYR Intraday credit facility is automatically done whenever there are sufficient funds in the Participants' MYR Settlement Account to redeem the earmarked securities in their K account. At MYR Settlement Cut-off time, MyClear will impose a penalty (refer to Appendix III of the Participation and Operation Rules for Payment and Securities Services) on Participants who fail to redeem their MYR Intraday credit facility.

11.5. In order to utilize the MYR Intraday credit facility, Participants must have adequate Eligible Securities in their K account. Eligible Securities would no longer qualify as collateral two (2) Business days before the securities' Final Redemption Date or Partial Redemption Date or Early Redemption Date. Participants shall monitor the redemption profile of the Eligible Securities in their K account to ensure that there is no shortfall in collateral due to upcoming redemptions.

11.6. BNM will exercise its sole discretion in tagging and identifying a certain value of Eligible Securities (Identified Securities) against the MYR Intraday credit facility granted to each Participant at any given time.

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11.7. All rights, title and interest in and to any of the Identified Securities shall vest in BNM free and clear of any liens, claims, charges or encumbrances or any other interest of the Participants or of any third party.

11.8. Though the Identified Securities may be represented in their K account, BNM has complete and full ownership, control and possession of the Identified Securities.

11.9. Nothing in this clause is intended to create or does create in favour of either party any mortgage, charge, lien, pledge, encumbrance or other security interest in the Identified Securities.

11.10. BNM retains the absolute right to remove the Identified Securities from the Participants' K account at any given time.

11.11. Provided that the Participant discharges its obligation under the MYR Intraday credit facility within the stipulated time, BNM has the obligation to return only securities equivalent to the Identified Securities of the same type, nominal value, description and amount.

11.12. For the avoidance of doubt and without prejudice to Clause 11.11., if a Participant fails to discharge its obligations under the MYR Intraday credit facility, BNM reserves complete and full rights, title and interest over the Identified Securities.

11.13. While BNM does not currently charge any interest on MYR Intraday credit, a transaction fee per MYR Intraday credit tranche is imposed (Refer to Appendix III of the Participation and Operation Rules for Payment and Securities Services).

MYR Auto-Collateralized Overnight Funding Facility (ACOFF)

11.14. ACOFF is an overnight credit line that BNM offers to eligible Participants who are unable to settle their Interbank GIRO clearing positions during the MYR Evening Settlement Window.

11.15. ACOFF is granted through the outright sale of Eligible Securities from the eligible Participants' K accounts to BNM. Hence, eligible Participants shall ensure that sufficient Eligible Securities are placed in their K accounts.

11.16. Securities in K accounts would no longer be eligible as ACOFF collateral two (2) Business days before the securities' Final Redemption Date or Early Redemption Date or Partial Redemption Date or Coupon Date. Participants shall monitor the coupon and redemption

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profile of securities in their K accounts to ensure that there is no shortfall in Eligible Securities due to upcoming coupon payments and redemptions.

11.17. BNM will exercise its sole discretion in selecting and identifying the Eligible Securities (Identified Securities) in Participants' K accounts that BNM would purchase under ACOFF at any given of time.

11.18. BNM has the absolute right to transfer the Identified Securities from the Participants' K accounts to BNM's account through SSDS sale transactions when Participants require funding under ACOFF

11.19. All rights, title and interest in and to any of the Identified Securities shall vest in BNM free and clear of any liens, claims, charges or encumbrances or any other interest of the Participants or of any third party.

11.20. Nothing in this clause is intended to create or does create in favour of either party any mortgage, charge, lien, pledge, encumbrance or other security interest in the Identified Securities.

11.21. When Interbank GIRO clearing positions are posted into RENTAS during the MYR Evening Settlement Window, ACOFF will be automatically triggered to fund Participants whose Settlement Account balances are not sufficient to cover their Interbank GIRO clearing positions. The amount borrowed under ACOFF for a Participant is determined as follows:

Amount Borrowed Under ACOFF = IBG – SA

Where

i. IBG = Participant's Interbank GIRO clearing deficit amount

ii. SA = Participant's MYR Settlement Account balance

11.22. The amount borrowed under ACOFF would be collateralized against Eligible Securities sold to BNM. The valuation of Eligible Securities to determine the net price of Eligible Securities sold to BNM under ACOFF is as follows:

$$\text{Net price} = \frac{100 - \text{Margin}}{100} \times \text{Clean Market Price of Eligible Securities}$$

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The applicable Margin and Clean Market Price are determined by BNM. The Net price of Eligible Securities can be viewed in FAST.

Repayment of ACOFF for Participants Regulated Under the Financial Services Act

11.23. ACOFF can be fully or partially repaid within a MYR Settlement Window. For Participants Regulated Under the Financial Services Act (Conventional Banks) who borrowed under ACOFF but subsequently receive incoming funds from surplus Interbank GIRO clearing positions in the same MYR Settlement Window, RENTAS will automatically debit the Conventional Banks' MYR Settlement Accounts to repay ACOFF by buying back the securities which were previously sold to BNM. ACOFF borrowings that are repaid within the same MYR Evening Window is not subjected to any interest. Only the remaining overnight ACOFF amount will be subjected to the interest rate specified in the clause 11.26.

11.24. On the next Business day, Conventional Banks must settle all ACOFF borrowings by the "Repayment of ACOFF" time specified in Clause 9.2. Conventional Banks shall ensure that their MYR Settlement Accounts have sufficient funds to re-pay ACOFF.

11.25. Conventional Banks' repayment of ACOFF will be triggered automatically at the time specified in Clause 9.2. Conventional Banks re-pay ACOFF borrowings by automatically repurchasing the Identified Securities that were sold to BNM during MYR Evening Settlement Window on the previous Business day. Repurchases of Identified Securities to re-pay ACOFF would occur at net prices that are identical to the net prices used when the Participants borrowed from ACOFF the previous Business day.

11.26. ACOFF interest will be automatically debited from the Conventional Banks' MYR Settlement Accounts during repayment of ACOFF. The interest is calculated as follows:

Interest = (Amount borrowed under ACOFF x ACOFF Rate x No. of Days/365

Where:

ACOFF Rate = Ceiling Rate (currently at OPR + 25 basis points);

No. of Days = Business day of ACOFF Repayment – Business day of ACOFF Borrowing

BNM shall determine the ACOFF rate and has a right to vary the rates according to market condition. The ACOFF rate is currently set at the ceiling of the Overnight Policy Rate (OPR).

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11.27. For Conventional Banks that are unable to settle all their ACOFF borrowings by the "Repayment of ACOFF" time specified in clause 9.2, RENTAS will automatically draw on the Conventional Banks' Intraday Credit to repay ACOFF.

Repayment of ACOFF for Participants Regulated Under the Islamic Financial Services Act

11.28. For Participants that are regulated under the Islamic Financial Services Act (Islamic Banks), liquidity obtained under ACOFF is strictly on an overnight basis only. If an Islamic Bank who had obtained liquidity under ACOFF subsequently receives incoming funds from a surplus Interbank GIRO clearing position in the same MYR Evening Settlement Window, the Islamic Bank would not be able to undertake a same day re-payment of ACOFF using the incoming funds.

11.29. Islamic Banks may within 90 minutes of the "Repayment of ACOFF to BNM" time specified in Clause 9.2, make an offer to repurchase the Identified Securities that were sold to BNM during the MYR Evening Settlement window on the previous Business day. BNM, at its absolute discretion, may accept the repurchase offer, and sell the Identified Securities to the Islamic Banks at a price agreed by both parties.

11.30. For Islamic Banks that are unable to settle the repurchase transaction described in Clause 11.28, RENTAS will automatically draw on the Islamic Banks' Intraday Credit, if available, to facilitate the repurchase.

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12.0 STP Requirements for Efficiency Purposes

12.1. Participants shall adhere to the message content standards specified in Guideline I on MYR Third Party Payments when constructing the messages for transmission to counter-parties.

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13.0 Queue Management

13.1. If Participants do not have sufficient funds or sufficient securities, their transactions will be queued centrally at RENTAS CHS on a First-in, First-out (FIFO) basis.

13.2. There are two (2) types of payment queues, namely the normal queue and priority queue. During the RENTAS MYR Settlement Cut-off, all unsettled instructions in both the normal and priority queues will be cancelled by RENTAS CHS. Participants will be notified accordingly via online reports.

13.3. Normal Queue Management

13.3.1. Through MC, Participants may manage their MYR IFTS payment normal queue by:

i. Re-ordering their queued transactions; or

ii. Cancelling the queued transactions.

13.3.2. Participants may also make online real-time queries on their outgoing and incoming normal payment queues via MC and RENTAS iLINK.

13.4. Priority Queue Management

13.4.1. Only MyClear is allowed to re-order or cancel transactions in the priority queue.

13.4.2. Participants shall submit a form (as per Appendix IV) by facsimile to instruct MyClear to re-sequence or cancel transactions in the priority queue should the need arise.

13.4.3. Although Participants are not allowed to manage transactions in the priority queue, Participants may make online real-time queries on their outgoing and incoming MYR priority payment queues via MC and RENTAS iLINK.

13.5. Liquidity Optimization Settlement Facility

13.5.1. Liquidity Optimization Settlement Facility (LOSF) is the process of combining incoming or outgoing MYR payments in order to achieve a reduced net obligation.

13.5.2. The purpose of LOSF is to optimize liquidity. Through LOSF Participants are able to offset their outgoing MYR payments against incoming receipts, thereby reducing their liquidity needs.

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13.5.3. RENTAS provides an optional multilateral LOSF settlement track where Participants may voluntarily submit MYR IFTS transactions that are less time critical for LOSF settlement.

13.5.4. LOSF settlement is only available for MYR IFTS transactions. There is no LOSF settlement for SSDS and PvP transactions.

13.5.5. Participants may designate MYR IFTS transactions for LOSF settlement by entering a specified Transaction Reference Number (TRN) code into the transactions.

13.5.6. Participants may submit same day LOSF settlement transactions to RENTAS at any time between 9:00 am to 4:00 pm. RENTAS will perform LOSF in specified settlement time intervals. After 4:00 pm, LOSF transactions submitted for same day value will be reverted to gross settlement immediately.

13.5.7. LOSF transactions submitted between the pre-determined LOSF settlements time will be queued until the next available LOSF settlement time slot.

13.5.8. Participants may opt to remove their transactions from the LOSF settlement queue. Transactions removed from the LOSF settlement queue will automatically be submitted for gross settlement.

13.5.9. If a LOSF settlement batch cannot be settled because one or more Participants do not have sufficient funds, RENTAS will make three attempts to perform the LOSF settlement after a specified time interval. After three attempts, all transactions in the failed LOSF settlement batch will be reverted to gross settlement.

13.5.10. Participants may also submit forward dated transactions for LOSF settlement. Forward dated transactions will be queued until the first LOSF settlement pre-determined time slot on the settlement date.

13.5.11. Participants are able to view the status of their LOSF settlement transactions via RENTAS iLINK.

14.0 SSDS Processing

14.1. While the responsibility to initiate SSDS sales, repos and transfers lie with the seller or transferor, the buyer or transferee has a responsibility to promptly confirm the sales or

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transfer to allow the Settlement to complete. The purchaser or transferee shall confirm the sales or transfer within the deadline stipulated in clause 67.1 and 67.2 of Operational Procedures for Securities Services.

14.2. Upon confirmation by the buyer, the transaction will be settled on a DvP basis.

14.3. SSDS transactions which are pending for Settlement, such as forward-dated transactions before their value date, may be cancelled by the Participant who initiated the transaction, subjected to the confirmation of their counterparty.

14.4. On the Settlement date, sales and transfers that are pending due to insufficient securities cannot be cancelled by Participants once the transaction is confirmed by the purchaser or transferee. These transactions will automatically be cancelled by the system at MYR Settlement Cut-off. Repo transactions, both 1st leg and 2nd leg transactions, that are pending due to insufficient repo collateral may be cancelled by either party to the transaction, subjected to the confirmation of the counterparty.

14.5. Specified RENTAS Securities

14.5.1. RENTAS CHS processes all securities transactions on a real-time basis during MYR Settlement Business hours. Forward-dated transactions received will be stored in the RENTAS CHS database and RENTAS CHS will process such transactions only on their value date.

14.5.2. If the value date of a payment falls on a Business day that is subsequently declared a public holiday, the RENTAS CHS shall defer processing such transactions to the next Business day.

14.5.3. Although RENTAS CHS automatically adjusts the value date of transactions to the next Business day in the event of a holiday, the proceeds of the transactions remain unchanged. MyClear will not input additional days of accrued interest or other adjustments arising from the delayed Settlement due to holidays.

14.6. Private Debt Securities (Non-specified RENTAS Securities)

14.6.1. Subject to funds availability, all same-day-value and forward-dated transactions shall be credited to or debited from the MYR Settlement Account of the Participants on the same day or on value date, as the case may be.

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14.6.2. All interest, coupon, dividend and redemption payments will be paid on a Business day. In the event that the interest, coupon, dividend or redemption date falls on a holiday, the payment of interest, coupon, dividend and redemption proceeds shall follow as stated in Part XI (Holiday Convention) of the Operational Procedures for Securities Services.

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15.0 Request for Extension of PvP Link Cut-off Time

15.1. Participants are required to observe the PvP Link Cut-off scheduled at all times to ensure industry-wide operational efficiency.

15.2. MyClear may, in exceptional circumstances, consider extending the PvP Link Cut-off time when the extension of time is necessary to avoid settlement failures that pose a systemic risk to the system. Any extension of time has to be mutually agreed upon by both MyClear and HKMA.

15.3. Requests for extension shall be made to Payment Services officers of MyClear as listed in Appendix 1 by telephone at least forty-five (45) minutes before the scheduled PvP Link Cut-off time. MyClear may reject any request made less than forty-five (45) minutes before the PvP Link Cut-off time. In such circumstances, MyClear shall not be held responsible for any losses incurred by the Participants.

15.4. Participants shall fax the duly completed form (as specified in Appendix II (a)) for the request of extension of PvP Link Cut-off time, preferably within 30 minutes of the verbal request for extension.

15.5. MyClear will not grant an extension of PvP Link Cut-off time exceeding MYR Settlement Cut-off time except in circumstances where MyClear deems the extension necessary to avoid systemic risks to RENTAS participants.

15.6. MyClear will inform the industry through RENTAS broadcast message in the event of any extension of PvP Link Cut-off time.

15.7. Participants requesting a PvP Link Cut-off extension grants MyClear the right to publicly disclose all information pertaining to the Participants' PvP Link Cut-off extension request.

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16.0 Request for Extension of MYR Settlement Cut-off Time

16.1. Participants are required to observe the MYR Settlement Cut-off schedule at all times to ensure industry-wide operational efficiency.

16.2. However, MyClear may, in exceptional circumstances, consider extending the MYR Settlement Cut-off time when:

16.2.1. Participants' are unable to settle their respective MYR Intraday credit;

16.2.2. The extension of time is requested by BNM under exceptional circumstances; and

16.2.3. The extension of time is necessary to avoid Settlement failures that pose a systemic risk to the system.

16.3. Any requests for extension shall be made to MyClear via telephone by contacting the Payment Services officers listed in Appendix I at least fifteen (15) minutes before the scheduled MYR Settlement Cut-off time. MyClear may reject any request made less than fifteen (15) minutes before the MYR Settlement Cut-off time in such circumstances, MyClear shall not be held responsible for any losses incurred by the Participants.

16.4. Participants shall fax the duly completed form (as specified in Appendix II (b)) for the request of extension of Cut-off time, preferably within 30 minutes of the verbal request for extension.

16.5. In the interest of operational efficiency, MyClear may act upon verbal requests for extension of Cut-off time by the Participants.

16.6. MyClear will inform the industry through RENTAS broadcast messages in the event of any extension of Cut-off time.

16.7. Participants requesting a cut-off extension grants MyClear the right to publicly disclose all information pertaining to the Participants' cut-off extension request.

16.8. MyClear will not grant an extension exceeding two (2) hours except in circumstances where MyClear deems the extension necessary to avoid systemic risks to RENTAS participants.

16.9. Participants who have completed all transactions, repaid all outstanding MYR Intraday credit and settled all obligations to BNM may close their operations at the scheduled MYR Settlement Cut-off time of 6:00 pm even if there is a cut-off extension.

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16.10. Participants whose MYR Settlement Cut-off extension request is granted, will be subjected to penalties as specified in Appendix III of the Participation and Operation Rules for Payment and Securities.

16.11. Participants may not "free-ride" on another Participant's MYR Settlement Cut-off extension request. If a Participant requests a MYR Settlement Cut-off extension and a second Participant subsequently requests for a further extension beyond the first request, both Participants will be subjected to penalties for cut-off extension:

16.11.1. The first Participant's penalty is calculated based on the duration from the scheduled MYR Settlement Cut-off of 6:00 pm to the extended cut-off time requested by the first Participant.

16.11.2. The second Participant's penalty is calculated based on the duration from the scheduled MYR Settlement Cut-off of 6:00 pm to the extended cut-off time requested by the second Participant.

16.12. MyClear will notify the CEOs of Participants who have incurred recurring penalties for cut-off extensions.

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17.0 Incident Report (IR)

17.1. Once MyClear has granted the Participants' request to extend the MYR Settlement Cut-off time, the Participants are required to submit a complete Incident Report (IR) to MyClear via facsimile within 24 hours of the initial cut-off extension request. (Please refer to Appendix III for the IR template).

17.2 Apart from IRs for MYR Settlement Cut-off extensions, Participants are also required to submit an IR to MyClear should there be any incident that materially impacts their RENTAS operations, including but not limited to, operational disruptions of more than 15 minutes, major system failures or downtime, degradation in system performance, security breaches and fraud, as well as failures to settle obligations.

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18.0 Compensation on Inter-Bank Failed Settlements

18.1. Participants are encouraged to resolve any claims for compensation arising from failed Settlements amicably.

18.2. The Guidelines for Compensation on Inter-bank Failed Settlements (as specified in Guideline II) provide a mechanism to compute compensation in situations of Settlement failure or delayed Settlement.

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19.0 Managing Unpaid Credit Facilities

Managing Unsettled MYR Intraday Credit

19.1. Participants are required to ensure that they have sufficient funds to repay and settle all MYR Intraday credit extended by BNM before the MYR Settlement Cut-off time.

19.2. Towards this end, Participants shall monitor closely the amount of MYR Intraday credit that is not repaid after the scheduled MYR Intraday credit cut-off time. Prior to the MYR Intraday credit cut-off time, any excess balance in the Participants' MYR Settlement Account will be used to fund outgoing transactions.

19.3. After the MYR Intraday credit cut-off time, RENTAS will re-prioritize how excess funds are applied and will automatically apply these excess funds towards repaying MYR Intraday credit. After all MYR Intraday credit is repaid, RENTAS will allow Participants to utilize the remaining excess balance for transactions.

19.4. Should a Participant encounter difficulties in repaying MYR Intraday credit sixty (60) minutes before the scheduled MYR Settlement Cut-off time, the Participant shall immediately determine the following:

19.4.1. If there are any MYR incoming transactions that will increase the MYR Settlement Account balance and allow the Participant to repay the MYR Intraday credit;

19.4.2. If they have sufficient excess balances in the statutory reserve account that can be transferred to the MYR Settlement Account to repay the MYR Intraday credit[4];

19.4.3. Whether they are able to source for funds from other Participants; and

19.4.4. If there are any other avenues to source for funds.

19.5. After exhausting all possible funding avenues indicated above, the Participant may make a request for funding under BNM's Guidelines on Standing Facilities issued in May 2012.

19.6. If funding is forthcoming from BNM, the Participant's dealers must remain in the Participant's premises and must be contactable until RENTAS MYR Settlement Cut-off.

19.7. The Participant shall ensure that sufficient back office Settlement staff is available to complete the Settlement of the borrowing under the standing facilities. The staff must be

[4] If there are sufficient excess balances in the statutory reserve account that can be transferred to the Settlement Account to repay the MYR Intraday credit, Participants must ensure that they remain in compliance with statutory reserve requirements

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competent and must have familiarity with the construction of repo transactions or any other form of transaction used for the funding.

19.8. If funding transaction cannot be completed by MYR Settlement Cut off time, MyClear, in consultation with BNM, may opt to convert unredeemed MYR Intraday credit to an overnight repo. The Participants shall grant BNM the sole authority to determine the rates, tenor and other terms in converting the MYR Intraday credit into an overnight lending.

19.9. As a final measure, BNM reserves the right to take possession of the collateral i.e. collateralized loans against the eligible collaterals and has the authority to determine the value of the collateral. If there is any shortfall in the collateral value against the unpaid MYR Intraday credit, the Participants shall remain liable to BNM for the shortfall.

19.10. MYR Settlement Cut-off Time will not be closed until all MYR Intraday credit is repaid or extinguished. If a MYR Settlement Cut-off extension becomes necessary due to the Participant's inability to repay the MYR Intraday credit, notwithstanding any penalties or punitive rates imposed by BNM, the Participants will still be subjected to penalties imposed by MyClear for not repaying the MYR Intraday credit before the MYR Settlement Cut-off time as well as penalties for extending the MYR Settlement Cut-off time. Detailed MyClear penalty charges are as listed in the Appendix III of the Participation and Operation Rules for Payment and Securities Services.

19.11. If the MYR Settlement Cut off time has been extended, Participants may repay their MYR Intraday credit up to the extended MYR Settlement Cut off time. In the event the Participant fails to repay the Intraday credit by the extended MYR Settlement Cut off time, the Participant will be subjected to both penalties for not repaying their Intraday credit, as well as penalties for extension of the MYR Settlement Cut off time. The duration of the extension will be calculated from the original MYR Settlement Cut off time of 6:00 pm.

Managing Unpaid Auto-Collateralized Overnight Funding Facility (ACOFF)

19.12. Participants shall ensure that there are sufficient funds in their MYR Settlement Account to repay ACOFF through re-purchase of the Eligible Securities that were sold to BNM on the previous Business day.

19.13. Participants must settle all ACOFF borrowings by the 'Repayment of ACOFF' time specified

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in Clause 9.2[5]. If a Participant is unable to do so, the Participant may draw on their Intraday Credit to repay ACOFF, resulting in a rollover of the ACOFF borrowing from the previous Business day into an Intraday credit. Such rollover does not constitute good liquidity management and repeated rollovers may result in imposition of General Non-Compliance Penalties.

[5] Except for Islamic Banks, who are allowed 90 minutes from the 'Repayment of ACOFF' time to conclude a repurchase transaction with BNM at a mutually acceptable price

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20.0 e-PKI Requirements

20.1. RENTAS requires its Participants to deploy digital certificates issued by Licensed Certification Authority (CA) to perform the necessary e-PKI functions in RENTAS. Currently, there are two CAs; namely Digicert Sdn. Bhd and MSC Trustgate Sdn. Bhd.

20.2. These digital certificates can be purchased and registered for individuals or organisations based on the Participants' internal controls and internal procedures.

20.3. Participants are encouraged to have certificates from both CAs to avoid reliance on a single CA.

20.4. Participants are also required to have a token-based digital certificate for its e-PKI functions to activate the MC backup facility at MyClear's premise.

20.5. Participants are responsible for monitoring the expiry dates of their respective digital certificates. They shall renew the certificates at least one (1) month prior to the expiry date of the certificates.

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21.0 RENTAS iLINK User Identification (ID) Registration

21.1. All digital certificates of authorised officers who have access to RENTAS must first be registered in RENTAS iLINK. This registration must also be performed upon certificate renewal at the end of the certificate validity period. Procedures on the digital certificates registration in RENTAS iLINK are provided in the iLINK User Guide.

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22.0 Digital Certificates

22.1. Participants shall liaise directly with the CAs to purchase, renew, suspend or revoke their digital certificates.

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23.0 Authenticity, Confidentiality and Irrevocability of the RENTAS MYR Settlement Messages

23.1. Participants cannot repudiate any transmitted messages or payments that they have digitally signed.

23.2. For forward-dated transactions, a digital signature is verified based on the validity of the corresponding digital certificate on the date the transaction is initiated.

23.3. If a Participant has revoked a digital certificate, all messages or instructions transmitted by and signed using the digital certificate prior to the revocation shall be deemed valid.

23.4. Receiving Participants will receive a cryptographic error notification in their MC system when a transaction fails the digital signature verification. The receiving Participant must then investigate the cause of the digital signature verification failure and validate the integrity and authenticity of the affected transaction manually to independently ascertain the legitimacy of the transaction.

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24.0 Minimum Transaction Amount

24.1. The minimum amount for MYR third party payments is RM10,000. The minimum limit is not applicable for payments executed in favour or by order of BNM, the Government, statutory bodies or any other institutions specified by MyClear from time to time.

24.2. There is no minimum amount for payment in favour or by order of the RENTAS MYR Settlement Participant's own account.

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25.0 Billing

25.1. Participants are subjected to fees and charges as stated in Appendix III of the Participation and Operation Rules for Payments and Securities Services.

25.2. MyClear will automatically debit the Participants' MYR Settlement Accounts for the billed amount on the first Business day of the following month or any time as determined by MyClear.

25.3. Participants shall check their billing advices and inform MyClear of any discrepancies, including erroneous billing within fourteen (14) calendar days of receipt of the billing statements.

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26.0 Online Host Enquiry

26.1. Participants may perform online queries in RENTAS MC or RENTAS iLINK to obtain up-to-date RENTAS MYR Settlement information.

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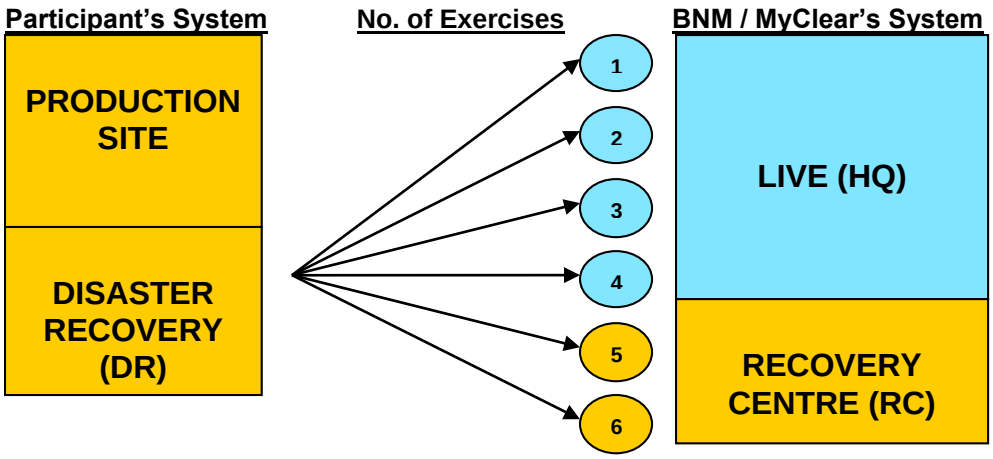
27.0 Business Continuity Management (BCM)

27.1. The Participants' BCM readiness can be ascertained by conducting the Business Continuity Plan (BCP) and Disaster Recovery Plan (DRP) exercises.

27.2. Participants are required to conduct BCP and DRP exercises by operating using their RENTAS MC System at their respective recovery / DR at least six (6) times a year with live transactions, of which two (2) of them involve connecting to MyClear's recovery site as illustrated below.



Note: Participants will be notified accordingly whenever MyClear operates its services from its Recovery Centre.

27.3. Scenarios for the BCP and DR exercise may include, but are not limited, to the following[6]:

Scenario	Operational Location			
	MC Workstation	MC Server	Network Connectivity[7]	Participants' Internal Systems[8]
1	DR	Production Site	Production Site	Production Site
2	DR	DR	Production Site	Production Site
3	DR	DR	Production Site	DR
4	DR	DR	DR	Production Site

[6] For Participants who have completed the requirements as at 31 December 2014, they shall attempt to cover as many applicable scenarios as possible, until the full implementation of new RENTAS scheduled in 2016.
[7] Network connectivity refers to the point where the NWI originate at the Participant's site.
[8] Participant's Internal Systems refers to all systems belonging to the Participant that originate RENTAS transactions for transmission to RENTAS.

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Scenario	Operational Location			
	MC Workstation	**MC Server**	**Network Connectivity[7]**	**Participants' Internal Systems[8]**
5	DR	DR	DR	DR
6	Production Site	Production Site	Production Site	DR
7	Production Site	Production Site	DR	DR
8	Production Site	DR	DR	DR
9	Production Site	DR	Production Site	DR
10	Production Site	DR	DR	Production Site
11	Production Site	DR	Production Site	Production Site
12*	Production Site	Production Site Backup Server	Production Site	Production Site
13	DR	Production Site Backup Server	Production Site	Production Site
14	DR	Production Site Backup Server	DR	Production Site
15	DR	Production Site Backup Server	DR	DR

Participants shall attempt to cover all possible scenarios in their DR testing and should not confine their BCP and DR exercises to a limited number of scenarios. All scenarios should be tested every three (3) calendar years[9].

** For participants with production site back-up server, this scenario will only count once towards the requirement to perform six (6) BCP and DR Exercises*

27.4. Two (2) days prior to conducting the exercise, Participants are required to notify MyClear of their plan to conduct the exercise via e-mail at compliance.lvp@myclear.org.my.

27.5. Subsequently, within seven (7) working days from the exercise date, Participants are required to submit the Exercise Report to MyClear via email to compliance.lvp@myclear.org.my, indicating the results of the exercise (refer to Appendix II of the Participation and Operation Rules for Payments and Securities Services for the template).

27.6. MyClear will monitor participants' compliance with the BCM requirements specified herein and will impose penalties for non-compliance. The quantum of penalties is as specified in Appendix III of the Participation and Operation Rules for Payment and Securities.

[9] Three (3) calendar years is calculated from May 2011, or for new Participants joining RENTAS after May 2011, from the commencement date of their RENTAS operations.

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28.0 BCM Arrangements in Relation to RENTAS Failure

28.1. Member Computer (MC) Failure

28.1.1. MC failure may happen due to system, software, hardware or communication line failure, inadequate or failed internal processes, human errors, power outage or other unanticipated events.

28.1.2. In the event of MC disruption, Participants are required to assess immediately the severity of the failure. Where appropriate, Participants shall invoke the necessary recovery measures to resume normal operations. Participants are reminded that recovery efforts undertaken to resume normal operations shall be within the recovery time objectives (RTO) specified in Clause 10.3. of the Participation and Operation Rules for Payments and Securities Services.

28.1.3. Participants are required to inform MyClear immediately of any MC failure and other disruptions that are affecting their RENTAS system. After the initial notification, Participants are required to update MyClear every thirty (30) minutes on their recovery status and next-action-plan until the MC resumes normal operation.

28.1.4. Participants shall decide whether to move to its recovering / DR site within sixty (60) minutes of an MC failure.

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29.0 RENTAS CHS Failure at Live Site

29.1. To minimize the risk of disruption to the settlement operations of Participants, RENTAS CHS runs on fault tolerant technology, which allows the system to continue functioning uninterrupted when individual system components fail. In addition, MyClear maintains a RENTAS system at BNM's Recovery Centre that is updated in real-time so that all data and transactions are identical to the live RENTAS system.

29.2. In the unlikely event of RENTAS CHS failure, MyClear shall make use of e-mail, or SMS or BCP call tree to keep Participants updated on the recovery status and action plan every thirty (30) minutes until the RENTAS CHS resumes normal operation.

29.3. If MyClear decides to move its RENTAS CHS operations to its Recovery Centre, the activation of the RENTAS system at the Recovery Centre can be completed within two (2) hours.

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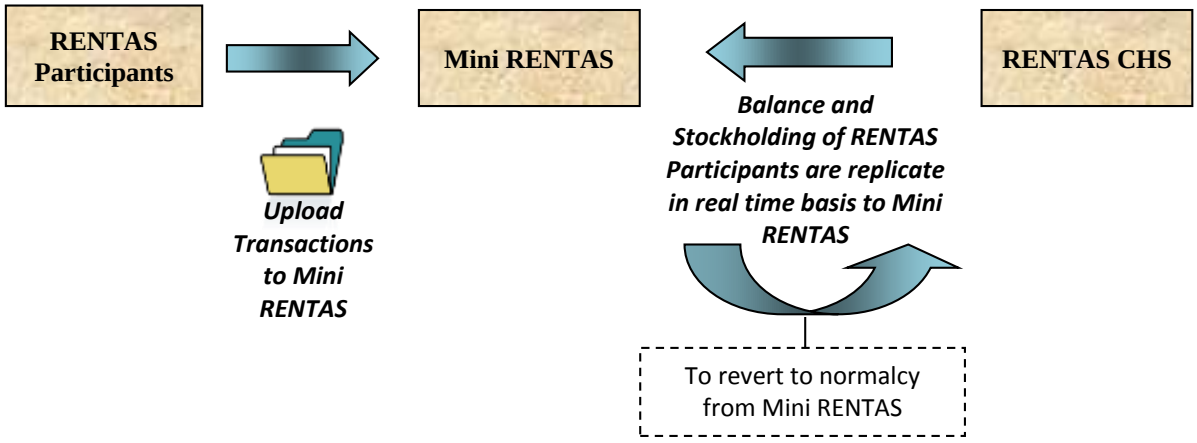
30.0 RENTAS CHS Failure at Both Live Site and Recovery Centre (RC)

30.1. In the unlikely event of total RENTAS CHS failure at both the Live Site and RC or the total failure of RENTAS Virtual Private Network, MyClear may activate the contingency system known as Mini RENTAS.

30.2. Mini RENTAS is intended to provide a minimal level of settlement services to RENTAS Participants.

30.3. Mini RENTAS can be accessed through internet at https://mr3.bnm.gov.my.


RENTAS Participants
Mini RENTAS
RENTAS CHS
Upload Transactions to Mini RENTAS
Balance and Stockholding of RENTAS Participants are replicate in real time basis to Mini RENTAS
To revert to normalcy from Mini RENTAS

30.4. MyClear will make use of e-mail, SMS or BCP call tree to notify RENTAS Participants regarding activation of mini RENTAS. MyClear shall transfer Participants most recent available Settlement Account balances and Securities Account balances to Mini RENTAS. Upon activation of Mini RENTAS, Participants shall verify their Settlement Account balances and Securities Account balances accordingly.

30.5. To perform settlement in Mini RENTAS, Participants shall initiate transactions in Mini RENTAS by uploading the transactions in the same format as the interface file used to initiate transactions via RENTAS MC. During activation, Mini RENTAS would perform settlement by offsetting the outgoing payments against incoming payments in specified time intervals.

30.6. Participants may make use of Mini RENTAS to perform online enquiry on their Settlement Account balances and Securities Account balances.

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30.7. The following transaction types can be settled in Mini RENTAS upon activation by MyClear:

30.7.1. IFTS Single Credit;

30.7.2. IFTS Multiple Credit;

30.7.3. IFTS Single Debit;

30.7.4. SSDS Sale;

30.7.5. SSDS Free of Payment; and

30.7.6. SSDS In-house.

30.8. Participants may only initiate transactions for same day value in Mini RENTAS.

30.9. If Participants had previously transmitted future dated transactions into RENTAS CHS prior to the failure of RENTAS CHS, such future dated transactions would not be transferred to mini RENTAS. Hence Participants would have to re-initiate these transactions in Mini RENTAS on the value date of the transactions.

30.10. For e-Debit, MEPS Cash, Shared ATM clearing, Interbank GIRO and Financial Processing Exchange clearing, Mini RENTAS would automatically generate a credit transfer for Participants who are short in the respective clearing position. This auto-construction of the credit transfer eliminates the need for Participants to manually construct a credit transfer to cover their clearing obligation. The affected Participants would have to verify and approve the credit transfer for the clearing house settlement to take place.

30.11. MyClear shall provide six (6) user IDs (4 Supervisor IDs and 2 Operator IDs) with the individual unique password to each RENTAS Participant. Participants shall ensure that these user IDs are safely kept for use in the event of Mini RENTAS activation.

30.12. To revert to normalcy, MyClear would deactivate Mini RENTAS and perform end day batch processing. Upon completion, MyClear would transfer Participants' latest Settlement Account balances and Securities Account balances to RENTAS CHS. Participants shall verify their Settlement Account balances and Securities Account balances accordingly.

30.13. MyClear will conduct annual test runs on Mini RENTAS. Participants are required to take part in the annual test runs.

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31.0 e-PKI Failure

31.1. RENTAS CHS is designed to withstand the complete failure of e-PKI. As such, the failure of e-PKI would largely be transparent to Participants. All transactions would remain protected using a backup security solution which provides data authenticity, integrity and non-repudiation features, thus ensuring the security of RENTAS at all times.

31.2. To ensure seamless and automatic activation of the backup security solution, Participants shall ensure that the e-PKI configuration at their MC system is in accordance with MyClear's specifications.

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32.0 Network Connectivity Failure

32.1. In the event RENTAS' secure private network fails, MyClear offers back-up ISDN connectivity to RENTAS via different third party provider.

32.2. Participants who have subscribed to the backup ISDN connectivity would be able to resume transmission of transactions to RENTAS by switching to the ISDN connectivity.

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33.0 Testing Procedure

33.1. Participants are allowed to use MyClear's RENTAS CHS test environment, if the need arises.

33.2. Participants shall submit their request to use the test environment by submitting the form in Appendix XII at least three (3) Business days prior to the scheduled testing.

33.3. The value date of the exercise shall default to the current value date, unless the Participant requests a different value date. Requests for a value date other than the current date will only be entertained on a case-by-case basis.

33.4. Fees imposed on Participants for use of the test environment is as stated in Appendix III of the Participation and Operation Rules for Payment and Securities. The fees will be levied based on the number of days of the planned exercise. Participants will not be reimbursed if the planned exercise is not conducted. If a request is made less than three (3) Business days prior to the test, the request will be deemed as an unplanned testing exercise for billing purposes.

33.5. Participants are not allowed to use the RENTAS CHS testing environment during RENTAS CHS live runs, weekends, public holidays and after office hours.

33.6. MyClear may also conduct RENTAS CHS test exercises and reserves the rights to make the testing mandatory for some or all Participants based on the objectives of the test exercise.

33.7. In the testing where the test scripts are to be provided by MyClear, the test scripts will be made available at least one (1) week before the actual exercise date.

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34.0 User Manuals

34.1. User manuals for RENTAS shall be provided by MyClear or its designated vendors.

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35.0 RENTAS Participants Directory

35.1. Participants shall furnish their latest contact information for business continuity purposes by updating the Member Directory in RENTAS iLINK. An up-to-date contact list is an essential component of BCP.

35.2. Participants shall maintain an updated list of RENTAS Authorised Signatories using the form in Appendix IX and submit to MyClear immediately upon changes.

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36.0 Customer Service

36.1. Participants may contact MyClear with regards to any RENTAS issue. The contact details for MyClear's and BNM's RENTAS MC operations are as per Appendix I. The contact information is also available in the Member Directory in RENTAS iLINK system.

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GUIDELINES

Guideline I - Guidelines on MYR Third Party Payments

1.0 Introduction

1.1. These guidelines are intended to standardize the content of key fields in RENTAS MYR IFTS messages for MYR third party payments to facilitate Straight-Through Processing (STP).

2.0 RENTAS MYR IFTS Messages Fields

2.1. Attached in Appendices VI and VII are snapshots of the RENTAS MYR IFTS message display screens, which the paying Participants are required to complete in order to transmit payment instructions to the receiving Participants.

2.2. The labelled fields "A" to "I" in Appendices VI and VII are to assist Participants in understanding the MC/PC and MC/400 transactions construct screen.

2.3. Transaction Reference Number (TRN) Code

2.3.1. The TRN Code field labeled "A" indicates the type of payment. (e.g. INT99 is used to denote interest payments).

2.3.2. All Participants shall distinguish third party transactions from inter-bank transactions through the use of different TRN codes.

2.3.3. The table below describes how the TRN codes IFT03, GOV03 and IFT00 should be used:

	MYR Third-party TRN		**MYR Inter-bank TRN**
Transaction Code	IFT03	GOV03	IFT00
Usage	MYR third party payments where the beneficiary or ordering party are non-RENTAS Participants	MYR third party payments where the beneficiary or ordering party are government bodies	MYR payments between Participants for their own accounts, e.g. clearing Settlement, trade finance transactions.

2.3.4. For other TRN codes, Participants shall use the TRN codes for the transactions as instructed by BNM's RENTAS Operations or MyClear.

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3.0 "Beneficiary Account Number" Field

3.1. The "Beneficiary account number" field comprises a 4-character alphanumeric branch code, followed by a 24-character alphanumeric account number.

3.2. This field refers to the receiving party's account details.

3.3. The "Beneficiary account number" field is a mandatory field and all Participants shall complete / input the field for all third party transactions, including over-the-counter customer transactions.

3.4. Participants shall adhere to the following when completing the "Beneficiary account number" field:

i. The branch number prefix shall be completed with '0001' if there is no branch code.
ii. If there is a branch code and the code is less than four (4) digits, the remaining digits shall be padded with trailing spaces.
iii. The account number field shall be completed in numeric only and shall not contain any dashes or special symbols.
iv. If the account number is less than 24 digits, the remaining digits shall be padded with trailing spaces.

3.5. Participants are advised to inform and educate their customers to ensure that they furnish the correct recipient account number when requesting for an MYR IFTS transaction.

4.0 "Beneficiary Name" Field

4.1. The "Beneficiary name" field refers to the recipient of the payment and is a mandatory field.

4.2. Participants shall key-in the beneficiary account name correctly. Participants are advised to inform and educate their customers to ensure that they furnish the correct recipient name when requesting for a MYR IFTS funds transfer.

4.3. Participants shall ensure that the field is completed with the exact customer name(s) and not in abbreviated form.

4.4. Participants shall not enter any other information other than the name of the beneficiary in this field.

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4.5. For non-third party transactions, this field shall be completed with the correct RENTAS Member BIC Code (e.g. BNMAMYKL for BNM).

5.0 "Beneficiary Address" Field

5.1. The "Beneficiary address" field refers to the address of the beneficiary of the payment and is not a mandatory field.

5.1. While the "Beneficiary address" field is not a mandatory field in RENTAS MC, Participants shall fill in the address of the beneficiary[10]. No other information shall be included in this field.

6.0 "Payment Details" Field

6.1. The "Payment details" field shall be used to provide relevant information that allows the beneficiary to understand the purpose of the payment and to facilitate reconciliation.

6.2. "Payment details" is a mandatory field and Participants shall complete the field with accurate information. The Payment Details field is divided into two (2) parts, namely "Payment Reference Number" and "Payment Description" . Participants may enter the reference or invoice numbers in "Payment Reference Number" and populate "Payment Description" with the purpose of payment, remitting customers' contact information, as well as other information that the remitting customer wishes to provide to the beneficiary. If there are no payment details available, the Participants shall insert "Not Applicable" in the payment details field or leave the field blank.

6.3. In addition to Clause 6.2, Participants shall ensure that :

i. the Beneficiary's statement displays the Ordering Party's Name, Payment Reference Number and Payment Description.
ii. the Ordering Party's statement displays the Beneficiary's Name, Payment Reference Number and Payment Description.

6.4. Participants shall state the return reason, if they are returning the payment, in the "Payment Details" field.

6.5. For Government agencies' accounts, Participants shall adhere to the instructions for the payment details field issued by the Government.

[10] In line with Anti-Money Laundering and Anti-Terrorism Financing Act (AMLA) 2001 requirements

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7.0 Account Number Field (by order of)

7.1. "The Account Number (by order of)" field comprises a 4-character alphanumeric branch code, followed by a 24-character alphanumeric account number and refers to the account number of the sending customer.

7.2. This field is mandatory and shall be completed by Participants.

7.3. For Participants who accept cash remittances over-the-counter, they need not complete this field for such transactions.

7.4. MyClear shall assume that all relevant particulars or the identity of the third party has been captured and verified by the Participants.

7.5. Participants shall adhere to the following in completing this field:

i. The branch number prefix shall be completed with "0001" if there is no branch code.
ii. If there is a branch code and the code is less than four (4) digits, the remaining digits shall be padded with trailing spaces.
iii. The account number field shall be completed in numeric only and shall not contain any dashes or special characters.
iv. If the account number is less than 24 digits, the remaining digits shall be padded with trailing spaces.

8.0 Name of Ordering Party (by order of)

8.1. The "Name of Ordering Party (by order of)" refers to the name of the sender, who requested for the IFTS funds transfer.

8.2. This field is mandatory. Participants shall complete this field and ensure that it is completed with the correct customer name(s).

8.3. MyClear assumes that all relevant information of the third party has been captured correctly and verified by the Participants.

8.4. Participants are advised to inform and educate their customers to furnish the correct information when initiating IFTS funds transfers.

8.5. Participants shall not enter information other than the name of the sender in the name field.

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8.6. For non-third party transactions, this field shall be completed with the correct RENTAS Member BIC Code (e.g. BNMAMYKL for BNM) instead of terms such as “ourselves” or “selves”.

9.0 Address Field (by order of)

9.1. The “Address (by order of)” field refers to the address information of the sender and is not a mandatory field.

9.2. Although it is not a mandatory field in RENTAS MC, Participants are required to fill in the correct address of the sender[11]. No other information shall be included in this field.

9.3. MyClear shall assume that all relevant information have been captured correctly and verified by the Participants.

10.0. Member to Member Information

10.1. The “Member to Member Information” field shall be used to provide information required for the counter party to process the payment instruction effectively. It shall contain information intended for use by the RENTAS MYR Settlement Participants.

10.2. Participants may enter special processing instructions or abbreviations agreed amongst the Participants such as three alphabet (3-alpha) abbreviation conventions, such as “SCA – Same Clearing Area” or “FMR-Form R required”, or any other information that the sending member would like to communicate to the receiving member.

10.3. Participants shall not use “Please Avoid Duplication” (PAD) in the Member-to-Member field when making a RENTAS payment.

11.0 Guarantee of Correctness

11.1. Participants should understand that the standardization of contents for key fields does not guarantee that the contents of all transactions are correct. Participants are advised to conduct their own risk assessment and impose their own checks and controls to detect incorrect content in transactions.

[11] For purpose of compliance with Anti-Money Laundering and Anti-Terrorism Financing Act 2001 (AMLA) requirements

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11.2. Participants shall verify and ensure the correctness of the transaction information at all time to mitigate the risk of wrongly crediting or debiting accounts.

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Guideline II - Guidelines on Compensation on Inter-Bank Failed Settlements

1.0 Principle and Scope

1.1. In the event of delayed payment or Settlement failures for MYR transactions, a mechanism for computing compensation is provided in this Guideline. The mechanism works on a compensation basis to cover losses. The mechanism is not intended to be punitive as no Participant shall benefit from the errors or Settlement failures of other Participants. Participants shall resolve and settle any compensation claim within thirty (30) working days from the date of the claim.

1.2. The paying Participant shall compensate the receiving Participants for loss of interest income arising from the errors made by the paying Participant. While it is the responsibility of the paying Participant to make payments, the receiving Participant may also advise the paying Participant if any payments expected are not paid in due time.

1.3. MYR Inter-bank Settlements are normally made for the following reasons:

1.3.1. From the paying Participant's own account and such payments are made for the credit of the receiving Participant as beneficiary (e.g. Settlement of Foreign Exchange or Money Market transactions);

1.3.2. On behalf of the paying Participant's customer and such payments are made for the credit of the receiving Participant as beneficiary (e.g. overdraft or loan repayment / financing payment);

1.3.3. From the paying Participant's own account and such payments are made for the credit of the receiving Participant's customer; and

1.3.4. On behalf of the paying Participant's customer and such payments are made for the credit of the receiving Participant's customer.

1.4. MYR Inter-bank failed Settlements are defined as:

1.4.1. Payments that do not meet the MYR Settlement Cut-off time for payments and settlements set out in the MYR Settlement Business hours stated in Clause 9.2. in the main section of this Operational Procedure;

1.4.2. Mis-sent payments; and

1.4.3. Non-payment.

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2.0 Compensation on MYR Inter-bank Failed Payments

Participants shall be guided by the following procedures in regards to the compensation on failed MYR inter-bank payments:

2.1. Compensation Coverage

2.1.1. If, for any reason, a payment error causes the receiving Participant to breach any of BNM's regulatory requirements or MyClear's Rules and Operational Procedures, and the receiving Participant is able to show proof that such non-compliance was a direct result of the error from the paying Participant, the interest or profit compensation shall include the payment of any penalty imposed by BNM and MyClear over and above the interest / profit compensation computed based on the prescribed formula under Clause 2.2. of this Guideline.

2.1.2. The paying Participant shall pay an administrative cost of RM200.00 to the receiving Participants to compensate for back valuation work or compensation work undertaken in rectifying payments.

2.1.3. The administrative cost of RM200.00 shall not be charged by the receiving Participants for the act of merely returning a payment that could not be posted to the beneficiary account.

2.1.4. The applicable interest rate termed as "Overnight Rate" in the prescribed formula under Clause 2.2. of this Guideline shall be the "overnight policy rate" as published by BNM.

2.1.5. Other costs and charges, such as forex cover, cable charges etc. shall be excluded when computing compensation for MYR inter-bank payment errors.

2.1.6. The compensation rules are also applicable to Participants and customers, which appoint the Participants as agents to handle their inter-bank payments. The Participants are reminded to advise their customers of the application of the administrative cost of RM200.00.

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2.2. Compensation Computation Formula

2.2.1. The paying Participants making any requests should inform the receiving Participants of the details of the payment to which such request relates and the particulars of the account to which it should be credited.

2.2.2 Late Intra-day Money Market Transaction

2.2.2.1. When payment is not effected within thirty (30) minutes of the transaction, the borrowing Participant / Investee will be entitled to compensation according to the compensation formula below:

$$\frac{Amount \times (OPR + R) \times Day}{36500}$$

where,

Amount	=	Amount due for the Settlement of the MYR transaction
OPR	=	Overnight Policy Rate as published by BNM
R	=	Comprise of Reserve Cost, Administration Cost and Penalty. The rate is currently set at 0.5% and subject to change
Day	=	Delay will be deemed as one day for interest calculation

2.2.2.2. When payment for an Intraday money market transaction has not been effected on value date by the Lending Bank / Investor by 5:00pm, the Intraday money market transaction would be deemed as a failed trade and no Settlement will take place. Under such circumstances, the Borrowing Participants / Investee will be entitled to claim compensation according to the following compensation formula:

$$\frac{Amount \times (OPR + R) \times Day}{36500}$$

where,

Amount	=	Amount due for the Settlement of the MYR transaction
OPR	=	Overnight Policy Rate as published by BNM

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R = Comprise of Reserve Cost, Administration Cost and Penalty. The rate is currently set at 0.5% and subject to change

Day = Delay will be deemed as one day for interest calculation

2.2.3. Value Date Adjustment / Use of Funds Compensation Claim Formula

2.2.3.1. For value date adjustment of the payment and the use of funds, the compensation claim will be paid according to the following formula:

$$\frac{Amount \times (OPR + R) \times Day}{36500}$$

where,

Amount = Amount due for the Settlement of the MYR transaction

OPR = Overnight Policy Rate as published by BNM

R = Comprise of Reserve Cost, Administration Cost and Penalty. The rate is currently set at 0.5% and subject to change

Day = Delay will be deemed as one day for interest calculation

2.2.4. Mis-sent Payment

2.2.4.1. A paying Participant may request the receiving Participant to return funds under the following circumstances:

i. If the payment should not have been sent;
ii. The payment was directed to a wrong Participant; and
iii. A duplicate payment / overpayment has been effected.

2.2.4.2. If the paying Participants notifies the receiving Participants of a mis-sent payment, the principal sum shall be returned by the receiving Participants under the following conditions:

i. The paying Participant shall confirm details of the mis-sent payment by transmitting a RENTAS credit notification (CRN) to the receiving Participants;

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ii. The paying Participant shall include date and details of the mis-sent payment in their CRN;

iii. The paying Participant shall forward to the receiving Participants copies of the RENTAS completion advices or its equivalent, for all the mis-sent payment via facsimile, e-mail or any other means;

iv. The paying Participant shall provide an indemnity to the receiving Participants;

v. The receiving participant may return the funds without beneficiary's consent if the sum has not been credited to the beneficiary's account;

vi. If the sum has been credited, the receiving Participants shall only return if:

- Both the receiving Participant and the paying Participant are fully satisfied that the beneficiary's account had been credited erroneously; and
- The funds are still in the beneficiary's account;

vii. The receiving Participants shall notify the beneficiary on the erroneous credit prior to debiting the account; and

viii. The refund is executed by initiating a new transaction since the mis-sent transaction's settlement is already final and irrevocable.

The receiving Participants making the refunds to the paying Participants shall be entitled to an indemnity from the paying Participants. The nature of indemnity is intended to protect the receiving Participants from any risk, loss or cost as a result of the paying Participants having entertained a request by its customers to "cancel" a prior payment to the account of the receiving Participants' customers. As such, paying Participants are advised to execute the indemnity only for their own payment errors and to be cautious in executing their customers' request to recall payments which may be under the guise of mis-sent payments.

2.2.4.3. If a wrong payment is made before or at 5:30 pm, the receiving Participants will, on a best effort basis, return the funds on the same day at no cost to either party. However, if the funds are returned before 5:30 pm on the next Business day, the paying Participants is entitled to the use of funds from Day 1 onwards, i.e. the day the wrong payment was made.

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2.2.4.4. If the wrong payment is made after 5:30 pm, the receiving Participants has up to 5:30 pm the next Business day to return the payment at no cost to either party. However, if the funds are not returned by 5:30 pm the next Business day, the paying Participants will be entitled to use of funds from Day 2 onwards. (please refer to Clause 2.2 of this Guideline for the "use of funds" compensation claim formula).

2.2.5. Late Payments / Repayments

2.2.5.1. Funds received after the scheduled MYR Settlement Cut-off time will be considered as next day value. Therefore, the receiving Participants shall be entitled to compensation based on the "Value Date Adjustment" formula as per Clause 2.2.3. of this Guideline.

2.2.5.2. The receiving Participants need not return the funds in order to claim the compensation.

2.2.6. Unable to Apply Funds Received

2.2.6.1. When the receiving Participants receives a payment and is unable to apply the funds due to discrepancies or insufficient details in the payment instruction, the procedure would be as follows:

i. The receiving Participants shall return the funds to the paying Bank immediately;
ii. The paying Participants may, however, request the receiving Participants to hold back the funds pending rectification;
iii. The receiving Participants may entertain this request at its discretion and retain the funds provided the paying Participants send a Credit Notification (CRN) immediately to the receiving Participants with the notation as stated in Clause 3.0;
iv. To rectify the payment instructions, the paying Participants must send another CRN to the receiving Participants with the notation as stated in Clause 3.0.

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3.0 Indemnity

3.1. In all cases where the receiving Participants return, rectify or withhold payments to or to the order of the paying Participants pursuant to the request of the paying Participants under Clauses 2.2.4.2. and 2.2.6. of this Guideline, the paying Participants shall indemnify the receiving Participants according to the terms set forth in this section. The paying Participants shall include in its request in the CRN the following notation:

"We indemnify you pursuant to paragraph 3 of the Guidelines on Compensation on Inter-bank Failed Settlements for *returning payment* / rectifying payment* / withholding payment** instructions."

** Delete whichever is not applicable*

3.2. The paying Participants shall indemnify the receiving Participants, its employees and agents against any and all claims, liabilities, losses, expenses (including all legal fees and disbursements), suits or damages resulting from the return, rectification, withholding or refund of payments by the receiving Participants pursuant to the request of the paying Participants.

3.3. The paying Participants shall return, on demand by the receiving Participants, all payment amounts returned or refunded by the receiving Participants pursuant to the request of the paying Participants. The paying Participants shall further indemnify the receiving Participants, its employees and agents against and all claims, liabilities, losses, expenses (including all legal fees and disbursements), suits or damages arising from the breach of this undertaking.

3.4. This Indemnity shall apply and be enforceable even if the receiving Participants effect a Settlement or compromise with regard to any claim for losses, damages and expenses without recourse to litigation if the receiving Participants deems fit. The paying Participants shall also pay to the receiving Participants all costs and expenses incurred in enforcing this Indemnity obligation and in taking legal advice in connection with this (including all legal fees and disbursements).

4.0 Validity of Compensation Claims

4.1. A compensation claim is deemed valid only if it is initiated within sixty (60) calendar days from the value of the transaction.

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Guideline III - Procedures for Activation of MC Back-Up System at MyClear's Premises

1.0 Introduction

1.1. MyClear implemented the MC backup facility at its premises to ensure that risk arising from the failure of a Participant's MC system is adequately addressed. The back-up facility is intended as a last resort back-up system for affected Participants.

2.0 Location

2.1. The location of the back-up MC system is as follows:

Malaysian Electronic Clearing Corporation Sdn Bhd (MyClear)
Large Value Payments and Securities Services Division
Level 10, Tower 2A,
Avenue 5, Bangsar South
8, Jalan Kerinchi
59200 Kuala Lumpur

2.2. Affected Participants are required to provide sufficient operational staff to invoke the activation of the backup MC system.

3.0 Activation Procedure

3.1. Activity by Participants

3.1.1. Participants shall submit an official request (form as per Appendix X) for the activation of the back-up facility signed by their Management.

3.1.2. Participants have two (2) options of inputting transactions, either by using the file upload facility or manual data entry.

3.1.3. The Participants should reach MyClear's premise within one (1) hour from the approval time to activate the back-up MC system at MyClear's premise.

3.1.4. Participants are required to bring all relevant documents as stated in Appendix XI for the RENTAS BCP Live Run checklist.

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APPENDICES

Appendix I - RENTAS – Contact Details

Office Addresses and Contact Details:

	Production	Back-up / Recovery Centre
Address	Malaysian Electronic Clearing Corporation Sdn. Bhd. (MyClear) Large Value Payments and Securities Services Division Level 10, Tower 2A, Avenue 5, Bangsar South 8, Jalan Kerinchi 59200 Kuala Lumpur	BNM Recovery Centre Lot 1064, Subang Hi-Tech Industrial Park Off Jalan Delima 1/1 40150 Batu Tiga Selangor
Telephone Number	03-22648667 03-22648668 03-22648671 03-22648672	03-56378575 03-56378446 03-56378227
Fax Number	03-22648669	03-56357944
E-mail address	rentas@myclear.org.my	

MyClear Payment Services (Application of Membership, Opening of Securities Account and Customer Services):

RENTAS Operation Team Contact Number:
03-2264 8666 / 03-2264 8671 / 03-2264 8672 / 03-2264 8673 / 03-2264 8674 / 03-2264 8675

BNM's RENTAS Operations at Jabatan Pengurusan dan Operasi Matawang (Opening of MYR Settlement Accounts, BNM's Payment and Securities Settlement Operations):

Name	Phone Number	Mobile Number	Email address
Chin Yi Sheng	03-26907417	-	yisheng@bnm.gov.my
En. Mohd. Noor Ali	03-26907414	-	cmali@bnm.gov.my
En. Azlan Mohd Shariff	03-26988044 ext. 8399	-	azlan@bnm.gov.my

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Appendix II (a) - Request For Extension of RENTAS PvP Link Cut-off Time

(Please use institution's letterhead)

Date: .....

To : Director
Large Value Payments and Securities Services Division
Malaysian Electronic Clearing Corporation Sdn Bhd (MyClear)
Level 10, Tower 2A,
Avenue 5, Bangsar South
8, Jalan Kerinchi
59200 Kuala Lumpur

From : .....

(RENTAS BIC)

Subject : **Request for Extension of RENTAS PvP Link Cut-off Time**

Tuan,

Kindly extend the RENTAS PvP Link Cut-off time for today ……from
(ddmmyyyy)
..... p.m. to ..... p.m. We hereby agree to pay the charges applicable for the extension.

The reason(s) for our request for extension is/are as follows:

.....

.....

.....

Thank you.

....

(*Authorised Signatory*) *(Authorised Signatory)*

Official Stamp:

For MyClear Payments Services Use Only

Message received by:	.....
Request allowed/disallowed by:	.....
Time :	.....
Fees Payable :	.....

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Appendix II (b) - Request For Extension of RENTAS MYR Settlement Daily Cut-off Time

(Please use institution's letterhead)

Date: .....

To : Director
Large Value Payments and Securities Services Division
Malaysian Electronic Clearing Corporation Sdn Bhd (MyClear)
Level 10, Tower 2A,
Avenue 5, Bangsar South
8, Jalan Kerinchi
59200 Kuala Lumpur

From : .....

(RENTAS BIC)

Subject : **Request for Extension of RENTAS MYR Settlement Cut-off Time**

Tuan,

Kindly extend the RENTAS cut-off time for today ..... from
(ddmmyyyy)
..... p.m. to ..... p.m. We hereby agree to pay the charges applicable for the extension.

The reason(s) for our request for extension is/are as follows:

.....

.....

.....

Thank you.

....

(*Authorised Signatory*) *(Authorised Signatory)*

Official Stamp:

For MyClear Payments Services Use Only

Message received by:	.....
Request allowed/disallowed by:	.....
Time :	.....
Fees Payable :	.....

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Appendix III - Incident Report From Participants

(Please use institution's letterhead)

Date: .....

To : Director
Large Value Payments and Securities Services Division
Malaysian Electronic Clearing Corporation Sdn Bhd (MyClear)
Level 10, Tower 2A,
Avenue 5, Bangsar South
8, Jalan Kerinchi
59200 Kuala Lumpur

From : .....

(RENTAS BIC)

Subject : **Incident Report From Participants**

Tuan,

Attached herewith the Incident Report for your attention and / or further action:

System Affected	RENTAS / eSPICK *(please circle one)*
From	
Date of Report	*(to send latest one day after the incident)*
Date and Time of Incident	
Chronology of Incident	
Causes	
Action Taken	
Preventive Measures	

Information Required:

Total No of Transactions Pending	Total Value of Transactions Pending (in RM)	Amount of Settlement Failure (in RM)	No of Counter-parties affected

Name:

Designation:

(Refer to authorised signature list – highest ranking)

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Appendix IV - Request To Re-sequence or Cancel Payment Instruction(s) In Priority Queue

(Please use institution's letterhead)

Date : .....

To : Director
Large Value Payments and Securities Services Division
Malaysian Electronic Clearing Corporation Sdn Bhd (MyClear)
Level 10, Tower 2A,
Avenue 5, Bangsar South
8, Jalan Kerinchi
59200 Kuala Lumpur

From : .....

(RENTAS BIC)

Subject : **Request to Re-sequence or Cancel Payment Instruction(s) in Priority Queue**

Tuan,

Kindly re-sequence / cancel* the following transactions in our Priority today:

Queue No	ISN No	Currency Code	Amount	TRN	New Queue No.
.....	.....	.....	.....	.....	.....
.....	.....	.....	.....	.....	.....
.....	.....	.....	.....	.....	.....

The reason(s) for our request is / are as follows:

.....

.....

Thank you.

....

(*Authorised Signatory*) *(Authorised Signatory)*
Official Stamp:

For MyClear Payments Services Use Only

Message received by:	.....
Request allowed / disallowed by:	.....
Time :	.....
Fees Payable :	.....

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Appendix V - Form A: New Participant

(Please use institution's letterhead)

Date : .....

To : Managing Director
Malaysian Electronic Clearing Corporation Sdn Bhd (MyClear)
Level 12, Tower 2A,
Avenue 5, Bangsar South
8, Jalan Kerinchi
59200 Kuala Lumpur

From : .....

(RENTAS BIC)

Subject : **Confirmation of Participation**

We refer to the application on the above.

1. We confirm our participation in the RENTAS system for (indicate all that are applicable)

☐ MYR Payments Services only;

☐ MYR Settlement Services, both payments and securities;

☐ Foreign Currency Payment Services only (specify currencies: _____);

☐ Foreign Currency Settlement Services, both payments and securities (specify currencies: _____);

☐ Securities Services only. We appoint the following institution as the authorised agent to manage and operate our daily operation for both securities transactions and the corresponding payment transactions in the RENTAS system.

Name of Agent	Currency

☐ Cross-Border Securities Custody Services

2. As the owner of the stipulated account(s) in RENTAS, we hereby agree to abide by all rules, operational procedures and guidelines issued by Bank Negara Malaysia and/or MyClear from time to time.
3. We hereby authorise MyClear to disclose information pertaining to my organisation's debt securities holdings under all custody codes in RENTAS to facility agents for the specific purpose of administering the debt securities.

Yours sincerely,

.....

(Signature of Chief Executive Officer)
Name:
For and on behalf of:
Official stamp:

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Appendix V - Form B: Existing RENTAS Participant Extends Membership to MYR Settlement Service

(Please use institution's letterhead)

Date : .....

To : Managing Director
Malaysian Electronic Clearing Corporation Sdn Bhd (MyClear)
Level 12, Tower 2A,
Avenue 5, Bangsar South
8, Jalan Kerinchi
59200 Kuala Lumpur

From : .....

(RENTAS BIC)

Subject : **Confirmation of Participation in Additional Services**

We refer to the application on the above.

1. We wish to extend our participation in RENTAS to:

☐ MYR Payments Services only;

☐ MYR Settlement Services, both payments and securities;

☐ Foreign Currency Payment Services only (specify currencies: _____);

☐ Foreign Currency Settlement Services, both payments and securities (specify currencies: _____);

☐ Securities Services only. We appoint the following institution as the authorised agent to manage and operate our daily operation for both securities transactions and the corresponding payment transactions in the RENTAS system.

Name of Agent	Currency

☐ Cross-Border Securities Custody Services

2. As the owner of the stipulated account(s) in RENTAS, we hereby agree to abide by all rules, operational procedures and guidelines issued by Bank Negara Malaysia and/or MyClear from time to time.
3. We hereby authorise MyClear to disclose information pertaining to my organisation's debt securities holdings under all custody codes in RENTAS to facility agents for the specific purpose of administering the debt securities.

Yours sincerely,

.....

(Authorised Signature and Institution Official Stamp)
Name:
For and on behalf of:
Official stamp:

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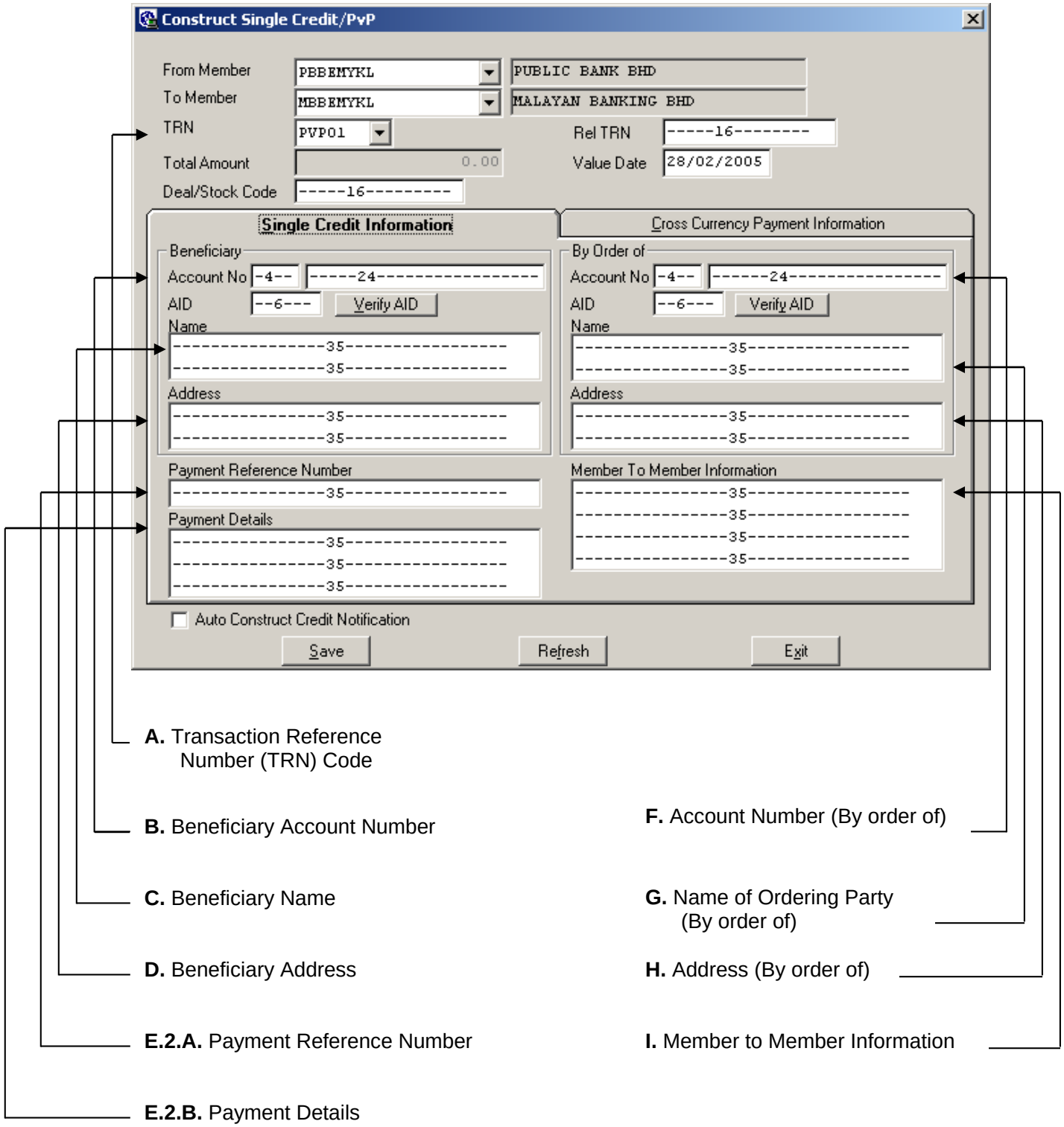
Appendix VI - Example of MCPC Screen Shot

Example of MCPC Screen Shot



A. Transaction Reference Number (TRN) Code

B. Beneficiary Account Number

C. Beneficiary Name

D. Beneficiary Address

E.2.A. Payment Reference Number

E.2.B. Payment Details

F. Account Number (By order of)

G. Name of Ordering Party (By order of)

H. Address (By order of)

I. Member to Member Information

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Appendix VII - Example of MC 400 Screen Shot

Example of MC / 400 Screen Shot

```
          1         2         3         4         5         6         7         8
12345678901234567890123456789012345678901234567890123456789012345678901234567890
================================================================================
1   BBBBBBBBBBB DD WW B1    CONSTRUCT SINGLE CREDIT/PVP  XXXXXXXXXX DDMMMYYYY HH:MM
2
3   Fr Member : <- - -X(17)- - ->   <- - - - - C (30) - - - - - ->
4   To Member : <- - -X(17)- - ->   <- - - - - C (30) - - - - - ->
5   TRN       : XXXXX                        Rel TRN   : <- - X (16) - ->
6   Amount    : MYR 9,999,999,999.99         Value Date: DDMMMYYYY
7   Deal Code/Stock Code : <- - X (16) - ->  Auto Construct CR Noti : C   (Y/N)
8   Beneficiary                              By Order of
9   A/C No: XXXX-<- - - -X (24)- - - - ->    A/C No: XXXX-<- - - -X (24)- - - - ->
10  AID   : XXXXXX   Name  :                 AID   : XXXXXX   Name  :
11  <- - - - - - X (35) - - -  - - - ->      <- - - - - - X (35) - - -  - - - ->
12  <- - - - - - X (35) - - -  - - - ->      <- - - - - - X (35) - - -  - - - ->
13  Address:                                 Address:
14  <- - - - - - X (35) - - -  - - - ->      <- - - - - - X (35) - - -  - - - ->
15  <- - - - - - X (35) - - -  - - - ->      <- - - - - - X (35) - - -  - - - ->
16  Payment Reference :
17  <- - - - - - X (35) - - -  - - - ->      Member To Member Information:
18  Payment Details:                         <- - - - - - X (35) - - -  - - - ->
19  <- - - - - - X (35) - - -  - - - ->      <- - - - - - X (35) - - -  - - - ->
20  <- - - - - - X (35) - - -  - - - ->      <- - - - - - X (35) - - -  - - - ->
21  <- - - - - - X (35) - - -  - - - ->      <- - - - - - X (35) - - -  - - - ->
22                                        Next Function: _____ Next BOR: ______
23  F2-Verify  F3-Exit  F7-Next Function  F8-Main  F12-Previous
24
================================================================================
```

A. Transaction Reference Number (TRN) Code

B. Beneficiary Account Number

C. Beneficiary Name

D. Beneficiary Address

E.2.A. Payment Reference Number

E.2.B. Payment Details

F. Account Number (By order of)

G. Name of Ordering Party (By order of)

H. Address (By order of)

I. Member-to-Member Information

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Appendix VIII - Contact Person for Daily Operation of RENTAS

(Please use institution's letterhead)

Date : .....

To : Managing Director
Malaysian Electronic Clearing Corporation Sdn Bhd (MyClear)
Level 12, Tower 2A,
Avenue 5, Bangsar South
8, Jalan Kerinchi
59200 Kuala Lumpur

From : .....

(RENTAS BIC)

Subject : **Contact Person for the Daily Operation of RENTAS**

Tuan,

Please be informed that the following is our contact person of RENTAS system and the details are given as follow:

Institution Name: .....

Name of the contact person: .....

Specimen signature of contact person: .....

Designation: .....

Department: .....

Contact address: .....

.....

.....

Contact telephone number: .....

Email address: .....

Yours sincerely,

(Signature and Institution Official Stamp)

Name:

Designation:

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Appendix IX - RENTAS – Authorised Signatories List

(Please use institution's letterhead)

Date: .....

To : Managing Director
Malaysian Electronic Clearing Corporation Sdn Bhd (MyClear)
Level 12, Tower 2A,
Avenue 5, Bangsar South
8, Jalan Kerinchi
59200 Kuala Lumpur

From : .....

(RENTAS BIC)

.....

(RENTAS Digit Code)

Subject : **RENTAS – Authorised Signatories List**

Tuan,

We submit herewith our Authorised Signatories List for all RENTAS matters referring to the member institution. This list shall take effect on .....

Name	Designation	Specimen Signature

Yours sincerely,

.....

(Signature and institution stamp)

Name: .....

Designation: .....

This signatories list must be authorised by the person who has the Power of Attorney (PA) or based on the Board of Directors' resolution.

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Appendix X - Activation of Member Computer Back-up System at MyClear

(Please use institution's letterhead)

Date: .....

To : Director
Large Value Payments and Securities Services Division
Malaysian Electronic Clearing Corporation Sdn Bhd (MyClear)
Level 12, Tower 2A,
Avenue 5, Bangsar South
8, Jalan Kerinchi
59200 Kuala Lumpur

From : .....

(RENTAS BIC)

Subject : **Activation of MC Back-up System at MyClear**

Tuan,

With reference to the above, we would like to request for activation of MC

..... backup at MyClear's premises on .....
(MCPC / MC400)* (dd/mm/yyyy)

The reason(s) for our request of activation is / are as follows:

.....

.....

.....

Thank you.

....
(*Authorised Signatory*) *(Authorised Signatory)*

Official Stamp:

For MyClear Payments Services Use Only

Message received by:	.....
Request allowed/disallowed by:	.....
Time :	.....
Fees Payable :	.....

Note:
Affected Participants must arrive at MyClear's premises within one (1) hour after the request of activation has been granted by MyClear.
* Please indicate your MC.

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Appendix XI - RENTAS BCP Live Run Checklist

RENTAS BCP Live Run Check List

Notes:

1. **Bring along Public Key Infrastructure (e-PKI) Token.**

2. **Bring along e-PKI Certificate Files.**
   Copy folder named "certs" from RENTAS MC Cryptography Module installation path at RENTAS MC Workstation (D:\RentasPKI\certs).

3. **Bring along the e-PKI Profile File.**
   Copy "Profile.ini" from RENTAS MC Cryptography Module installation path at RENTAS MC Workstation (D:\RentasPKI\Profile.ini).

4. **Bring along the source files or documents for those outstanding transactions.**
   i. Source files such as Outgoing Batch Interface file (IFTS or SSTS).
   ii. Documents such as all the documents related to the outstanding transaction's information that going to construct or send.

5. **For Participants Using MC / PC Platform:**
   Bring along the Production database backup disc.
   The backup disc will be used to restore tables into BNM BCP. The latest database copy shall be obtained either by :
   i. Performing an ad-hoc backup at the live MC, **or**
   ii. Retrieving the previous Business day's end-of-day full database backup file.

   (The above is only applicable for Participants using MS SQL 7.0 or MS SQL 2000 database software. For Participants with MS SQL 2005 databases, step 6 below is applicable)

6. **For Participants Using MC / 400 and Participants with MS SQL 2005 databases:**
   The RENTAS administrator has to be present to manually configure user information in RENTAS user profile.

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i. At MyClear's Premises: Prepare BCP Working Environment

Task	Task Description	Where	By Whom	Status
1.	**Member Activation on BCP Server** • Requires two (2) authorised users from MyClear's IT Service Provider. • Activate RENTAS member for selected FI (*Please refer to RENTAS BCP User Manual*).	BCP Server	MyClear	
2.	**Create Member Profile on BCP Workstation** • Requires only one (1) authorised user from RENTAS MC IT Service Provider. • Create member profile for the selected FI (*Please refer to RENTAS BCP User Manual*). *** Repeat the above steps for other workstations to be used for BCP.*	BCP Workstation	MyClear	
3.	**Replace Certificate Files and ePKI Profile File on BCP Server and BCP Workstations** • Rename D:\RentasPKI\profile_bcp.ini as D:\RentasPKI\profile_bcb_0101.ini. • Rename D:\RentasPKI\certs as D:\RentasPKI\certs_0101. • Place Certificate Files brought by FI into D:\RentasPKI\certs. • Place ePKI Profile File brought by FI into D:\RentasPKI and named it as profile_bcp.ini • Open D:\RentasPKI\profile_bcp.ini with text editor and amend the following:- ***At [General] Section*** ***home.dir****=D:\RentasPKI\epkiout* ***certrepo.url.num****=1* ***certrepo.url.1****=http://*10.104.0.119*:8084/certrepos/certrepos/*	BCP Server & BCP Workstation	RENTAS MC IT Service Provider	

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Task	Task Description	Where	By Whom	Status
	chs.backup*=settle2048@bnm.gov.my* ***For each of the Profile*** ***public.store.file*** *for each of the profile shall refer to its correspondent Certificate File located at D:\RentasPKI\certs (i.e. public.store.file=D:\RentasPKI\certs\XXX. cer)* *** Repeat the above steps for other workstations to be used for BCP*			
4.	**Verify all EPKI components are up-to-date in BCP Server and Workstations:** ➢ **BCP Server and Workstations ➔D:\RentasPKI** • *CryptoSrv.exe* • *CryptoSrv_TMLOG.exe* • *CDMProxy.exe* • *CDMProxy_TMLOG.exe* • *CDM.exe* • *CDM_TMLOG.exe* • *SCEDll.dll* ➢ **BCP Server ➔ D:\MCServer\Common** • *FECAPI.dll* • *SCEDll.dll* ➢ **BCP Server ➔ D:\MCServer*M<4 digit member code of BCP bank>***, for eg D:\MCServer\M0101 • *fecapicfg.ini* ➢ **BCP Workstations ➔ D:\MCClient\Common** • *FECAPI.dll* • *SCEDll.dll*	BCP Server	RENTAS MC IT Service Provider	

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Task	Task Description	Where	By Whom	Status
	➢ **BCP Workstations ➔ D:\MCClient*M<4 digit member code of BCP bank>***, for eg D:\MCClient\M0101 • *fecapicfg.ini*			
5	**Restart BCP Server and workstations** ➢ **BCP Server** • Stop CSP service for BNM • Start CSP service for BCP bank ➢ **BCP Workstations** • Stop CDM service for BNM • Start CDM service for BCP bank • Stop CDMProxy service for BNM • Start CDMProxy service for BCP bank	BCP Server & BCP Workstation	RENTAS MC IT Service Provider	
6.	**Restore Tables by FI (for MC / PC member only)** • Logon Windows workstation as “super”. • Run MCSuper application from desktop. • From MCSuper main menu, go to “Utility” → “Restore Tables”. • In “Restore Tables” screen, select ALL tables, then un-select 4 tables: ❖ DEPTPARMT ❖ PRTDEV ❖ SYSPARMT ❖ WSPARMT	BCP Workstation	Participant	
7.	**Startup MC/PC Server Application** • Logon Windows server as “rentas”. • From desktop, locate the FI’s RENTAS folder, run MCServer application. • For MC/PC member, use the Production user id to sign on MCServer.	BCP Server	Participant	

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Task	Task Description	Where	By Whom	Status
	• For MC/400 member, use the default user id (*provided* by RENTAS MC IT Service Provider) to sign on MCServer.			
8.	**Create User Profile <u>(for MC / 400 member only)</u>** • Logon Windows workstation as "rentas". • From desktop, locate the FI's RENTAS folder, run MCClient application. • Use the default user id (*provided by RENTAS MC IT Service Provider*) to sign on MCClient application • From MCClient main menu, go to "Database" → "User Parameter". • In "User Parameter Maintenance" screen, add in user information. • Use another default user id (*provided by RENTAS MC IT Service Provider*) to sign on MCClient application. • In "User Parameter Maintenance" screen, approve the user record.	BCP Workstation	Participant	
9.	**Proceed with the RENTAS operation** • Logon Windows workstation as "rentas". • From desktop, locate the FI's RENTAS folder, run MCClient application. • For MC / PC member, use the Production user id to sign on MCClient. • For MC / 400 member, use the user id created at task 7 to sign on MCClient.	BCP Workstation	Participant	

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ii. **At BNM BCP: After End of Operations**

Task	Task Description	Where	By Whom	Status
1.	**Remove Member Profile on BCP Workstation** • Requires only one (1) authorised user from BNM. • Remove member profile for the selected FI (*Please refer to RENTAS BCP User Manual*). *** Repeat the above steps for other workstations to be used for BCP*	BCP Workstation	MyClear	
2.	**Member Deactivation on BCP Server** • Requires two (2) authorised users from BNM. • Deactivate RENTAS member for selected FI (*Please refer to RENTAS BCP User Manual*)	BCP Server	MyClear	
3.	**Revert Certificate Files and ePKI Profile File on BCP Server and BCP Workstations** • Rename D:\RentasPKI\profile_bcp.ini as D:\RentasPKI\profile_bcb_<FI's Member Digit Code>.ini. • Rename D:\RentasPKI\certs as D:\RentasPKI\certs_<FI's Member Digit Code>. • Rename D:\RentasPKI\profile_bcp_0101.ini as D:\RentasPKI\profile_bcb.ini. • Rename D:\RentasPKI\certs_0101 as D:\RentasPKI\certs. *** Repeat the above steps for other workstations to be used for BCP*	BCP Server & BCP Workstation	RENTAS MC IT Service Provider	

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Appendix XII – Request Form for RENTAS Test Environment

1. Requester's Information		
Name:	BIC Code:	Digit Code:
Date:	E-mail:	Contact No.:
Department:		

2. Specify date(s) needed (please tick):

January ☐	☐1	☐2	☐3	☐4	☐5
February ☐					
March ☐	☐6	☐7	☐8	☐9	☐10
April ☐					
May ☐	☐11	☐12	☐13	☐14	☐15
June ☐					
July ☐	☐16	☐17	☐18	☐19	☐20
August ☐					
September ☐	☐21	☐22	☐23	☐24	☐25
October ☐					
November ☐	☐26	☐27	☐28	☐29	☐30
December ☐					
	☐31				

Remarks:

Management Approval (must be an Authorised Signature)

Signature:

Name:

Position:

Date:

Institution Stamp:

3. For MyClear Internal Use Only

Date Received:	Remarks:
Date Created/Deleted:	User ID:
Name:	Group ID:

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